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The Preliminary Archeological Inventory of the Savannah River Plant, Aiken and Barnwell Counties, South Carolina

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Description
Archeological investigations were conducted on the Savannah River Plant in Aiken and Barnwell Counties, South Carolina under contract with the United States Department of Energy by the Institute of Archeology and Anthropology, University of South Carolina. The purpose of the study was to perform a reconnaissance and prepare a preliminary inventory of archeological sites in the plant in order to provide land use planning information. During three 2.5 month field seasons, 309 discrete sites were located and recorded within the plant boundaries using an opportunistic sampling strategy which focused on disturbed and exposed ground surfaces in the 200,000 acre study area. Approximately 450 linear miles, representing only a small portion of the plant (less than 10%), were covered in the fieldwork. Results of the survey were primarily of three kinds. First, 3 site classes--those related to base settlements, large limited activity, and small limited activity functions--were determined. Second, 141 occupational components, spanning the Early Archaic through the Historic Periods, were recognized at 103 sites. Occupational density appears to have been greatest during the Woodland Period from 1000 B.C. to about A.D. 1000. The third research area involved an inspection of occupational variability within five environmental zones (Upland, Slope, Dry Terrace, Flooded Terrace and Floodplain) to describe changes in land use. No significant variation between time periods was recognized, indicating similar land use patterns relating to hunting and gathering. Highest site frequencies occurred in the Dry Terrace and Floodplain Zones, which suggests a focus of all major settlements in high potential resource zones. In general, the information in this report presents the largest site survey data base known for the Savannah River below the Fall Line and is therefore of importance to the local prehistory.

Keywords
Excavations, Savannah River Site, Savannah River Plant, Aiken County, Barnwell County, South Carolina, Archeology

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THE PRELIMINARY ARCHEOLOGICAL INVENTORY
OF THE
SAVANNAH RIVER PLANT,
AIKEN AND BARNWELL COUNTIES, SOUTH CAROLINA

by

Glen T. Hanson, Jr., Rachel Most and
David G. Anderson
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Prepared by the

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ABSTRACT

Archeological investigations were conducted on the Savannah River Plant in Aiken and Barnwell Counties, South Carolina under contract with the United States Department of Energy by the Institute of Archeology and Anthropology, University of South Carolina. The purpose of the study was to perform a reconnaissance and prepare a preliminary inventory of archeological sites in the plant in order to provide land use planning information. During three 2.5 month field seasons, 309 discrete sites were located and recorded within the plant boundaries using an opportunistic sampling strategy which focused on disturbed and exposed ground surfaces in the 200,000 acre study area. Approximately 450 linear miles, representing only a small portion of the plant (less than 10%), were covered in the fieldwork.

Results of the survey were primarily of three kinds. First, 3 site classes--those related to base settlements, large limited activity, and small limited activity functions--were determined. Second, 141 occupational components, spanning the Early Archaic through the Historic Periods, were recognized at 103 sites. Occupational density appears to have been greatest during the Woodland Period from 1000 B.C. to about A.D. 1000. The third research area involved an inspection of occupational variability within five environmental zones (Upland, Slope, Dry Terrace, Flooded Terrace and Floodplain) to describe changes in land use. No significant variation between time periods was recognized, indicating similar land use patterns relating to hunting and gathering. Highest site frequencies occurred in the Dry Terrace and Floodplain Zones, which suggests a focus of all major settlements in high potential resource zones. In general, the information in this report presents the largest site survey data base known for the Savannah River below the Fall Line and is therefore of importance to the local prehistory.

INTRODUCTION

This report summarizes the descriptive findings of preliminary archeological research on the Savannah River Plant, a property controlled by the United States Department of Energy (formerly the Energy Research and Development Administration, and earlier the Atomic Energy Commission). The purpose of the study was to provide the sponsor with a general overview and inventory of archeological resources within the plant in partial compliance with Executive Order 11593 and the National Environmental Policy Act of 1969. Although the study resulted in the accumulation of a large inventory of archeological sites, the compliance with 36 CFR Part 63 regarding the evaluation of site significance has not been completed because most of the research involved field recovery. Since the plant covers an area of more than 200,000 acres, this concentration on fieldwork was necessary to gain a perspective of the resources under consideration.

Very little previous archeological research had been conducted in the general vicinity of the plant, making efforts at initial research design formulation and predictive site location modeling impossible. In an area such as this for which there is little archeological information, it was concluded that a general field reconnaissance would yield the needed information for making statements of settlement patterning and occupational history. Other, more sophisticated, analyses have not been considered so that emphasis could be placed on characterizing a large sample of sites found during reconnaissance. Based on this research, the following phases of investigation can take advantage of the demonstrated patterning for development of more detailed models and research hypotheses. These models and hypotheses can then form the solid foundation for accurate assessments of archeological significance.

The study area is situated in the upper Coastal Plain physiographic province of South Carolina in Aiken and Barnwell Counties. The boundaries of the plant are illustrated in Figure 1. Three hundred square miles are enclosed by the plant boundaries, making the plant one of the largest tracts of federally controlled land in South Carolina. Thirteen areas in the plant have been developed for various Department of Energy purposes ranging from nuclear material processing to administrative office centers. No specific impact areas were examined as part of the overall reconnaissance, but rather a sample of widely dispersed locations was inspected for archeological sites. The goal of this dispersed sample was to gather a representative sample of the variability of site classes within the plant.

In total, three seasons of field investigations were undertaken by the Institute of Archeology and Anthropology between the fall of 1973 and the spring of 1977. The first season's work was directed by John Combes with the assistance of David Miller. The second season during the fall and winter of 1974-1975 was also directed by John Combes and executed by David Anderson and Robert Asreen. The final fieldwork was conducted during the months of January and February, 1977 under the direction

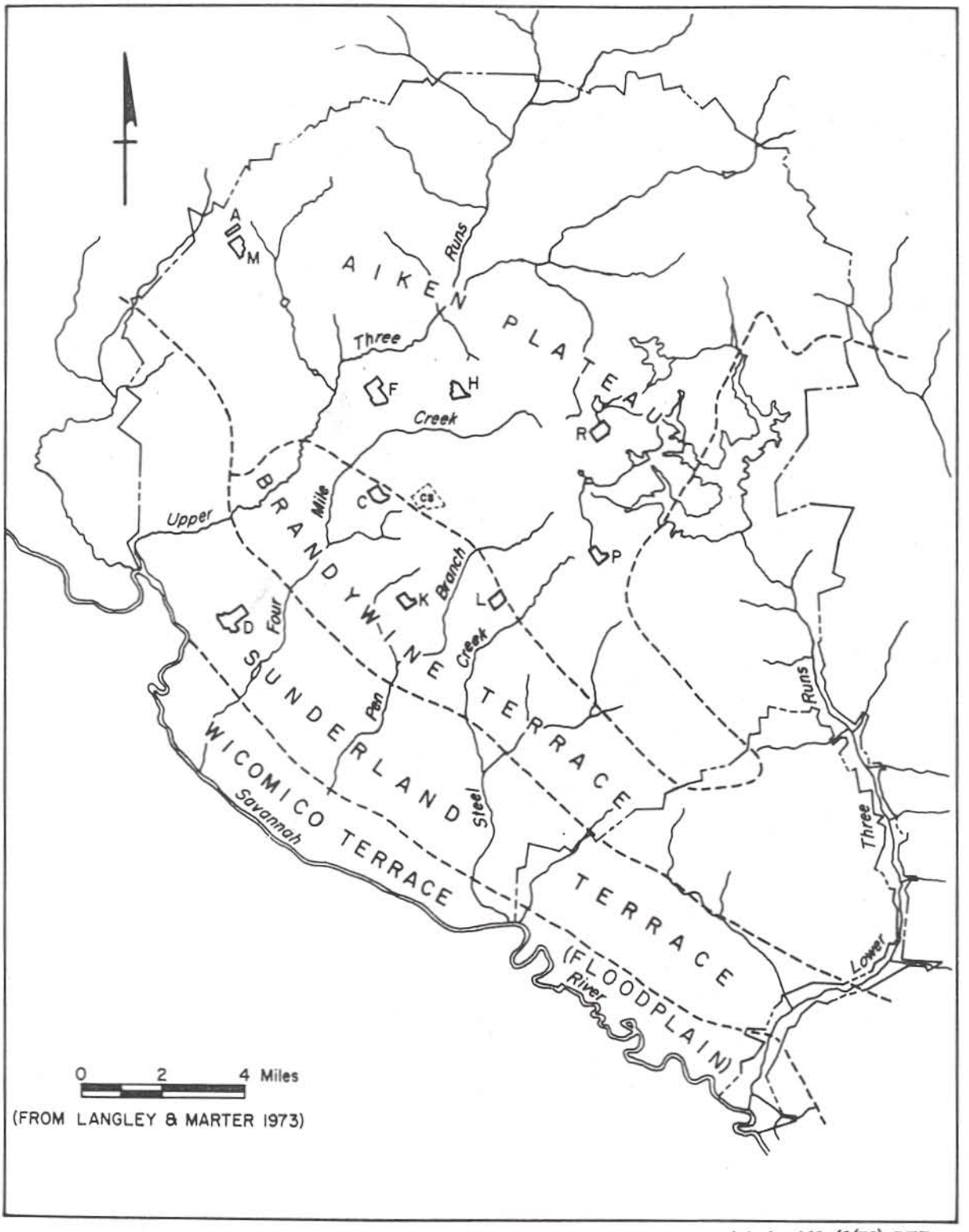

FIGURE 1. Coastal Terraces on the Savannah River Plant

of Glen Hanson who was assisted by Rachel Most. Laboratory analysis, which forms the basis for this report, was accomplished during the spring and summer of 1977 by Glen Hanson and Rachel Most. Preparation of this report combines the descriptive efforts of David Anderson and Rachel Most in the site inventory section and the synthesis of information by the senior author. All three authors worked in consultation in the preparation of much of the research represented, although at times across great distances.

Research goals and all aspects of the research conducted in this report were aimed at providing the sponsor with preliminary land use planning information. The results discussed in this report are basically descriptive, but are intended to provide insight into the potential for continued investigations of archeological resources within the plant.

All materials, records, maps and photographs related to this study are housed at the Institute of Archeology and Anthropology, University of South Carolina.

RESEARCH GOALS

This archeological project was from the outset oriented toward a set of limited yet specific research goals. Given the total size of the plant and the financial limitations placed on the reconnaissance, the following research goals were defined and adhered to during the field and laboratory research.

1) Archeological inventory was the major aim of the research and for that reason the majority of effort was placed on locating and recording archeological sites. Approximately 3/4 of the total time devoted to the project was spent in the field searching for sites. The principal understanding of the reconnaissance agreement was that it would be a preliminary task leading to continued support directed toward more detailed analytical procedures addressed at answering questions about the prehistoric and historic occupations along the Savannah River and associated uplands.

2) Archeological description of the sites recovered and associated artifact assemblages was the next major goal of the initial reconnaissance. Since laboratory time was limited and the total inventory exceeded 300 sites, preliminary sorting of artifacts into general types and general locational descriptions were determined to be the major analytical problems. We felt that this information would provide a sound basis for developing ideas about the settlement patterning within the study area and about the functional variability between sites. Further, the inspection of diagnostic artifact types such as projectile points and ceramics was undertaken to provide a preliminary indication of the chronological variability represented in the inventory.

3) Collection of environmental information concerning the plant was a tertiary goal of the reconnaissance. This portion of the research was minimal but was directed at the accumulation of specific ecological literature and unpublished information about the biotic and physical environments of the plant. The purpose of this goal was to establish an environmental context within which to study human land use through time.

4) Summarizing site data was a secondary goal of the project since the raw data would be available for later inspection. The intent of this type of inductive search for data patterning was to determine whether or not site locations were conditioned by specific environmental variables and to determine whether or not artifact assemblages varied with respect to environmental context.

5) The final and major goal was to provide the Department of Energy with a set of recommendations for future land use planning with emphasis on the presence of archeological sites. Such recommendations must consider various types of potential impact on the archeological record and alternative plans for the conservation of the record.

These five research goals were considered during all aspects of the research with priority being placed on the inventory, description and recommendation goals. This report reflects these priorities and must be considered as a starting point from which more intensive archeological research will be made possible. It is our intent to provide a useful aid for the conservation and management of the archeological record of the Savannah River Plant through a coordinated plan of continuing archeological management and study.

CONTEMPORARY ENVIRONMENT

Environmental Background

Archeological interest in modern and past environments centers on an attempt to understand the relationships between the humans and their natural habitat. The study of the articulations between man and the environment must rely heavily on information provided by natural historians, geologists, ecologists, botanists, and other natural and physical scientists. Since the establishment of the Savannah River Plant, such specialists have been involved in studies of the plant area and its surroundings from almost all possible scientific perspectives. Resulting from these more than twenty-five years of inquiry is a plethora of scholarly treatments in the fields of climatology (Falk, et al. 1953; Cooper and Rusche 1968), geology (Siple 1964, 1967), soils (Aydelott n.d.), botany (Batson and Kelley 1955a, 1955b, 1956, 1957; Sharitz n.d.), mammalian fauna (Jenkins and Provost 1964; Wood and Odum 1965; Golley, et al. 1965; Urbston and Rabon 1972), avifauna (Norris 1963), fish (Smith, et al. 1972), and reptilian fauna (Duever 1967). Augmenting this primary research, the Savannah River Ecology Laboratory of the University of Georgia has been involved in the constant examination of the plant area since its origin and has more than 450 published studies available for use in archeological research. Much of this information on the general Savannah River Plant has recently been synthesized by Langley and Marter (1973) and Beavers, et al. (1973) in publications which deal with the general plant site and ecological management, respectively. These latter two sources provide the basis for much of the following discussion.

General Environmental Information

The Savannah River Plant is a federally operated nuclear facility of approximately 300 square miles located along the Savannah River about 25 miles southeast of Augusta, Georgia. This large land area is situated within the Upper Atlantic Coastal Plain physiographic province which is primarily composed of unconsolidated sediments of Cretaceous age or younger (Langley and Marter 1973: 17). This general area falls within the Oak-Hickory-Magnolia Forest Ecotone described by Shelford (1963: 86-88) which is characterized by a pine to scrub oak succession in xeric areas and a more stable oak-hickory sere for hydric contexts. The climate in the general area may be described as mild, with monthly temperature averages ranging from 48°F in January to 81°F in July and an annual mean humidity of 70% (Langley and Marter 1973: 65). Precipitation averages 47 inches with extremes ranging from 28.8 inches to 73.5 inches (Langley and Marter 1973: 73).

The general topography of the study area can best be described in relation to the surface geological structure which is composed of two major components: the Aiken Plateau and the Pleistocene Coastal Terraces (Fig. 1). Composed of sandy sediments, the Aiken Plateau dominates the northern portion of the area and generally ranges in altitude from 270 feet to 400 feet. This feature forms the headwaters of four of the major stream systems present within the study area and those of tributaries of Upper Three Runs Creek. The general topographic picture in the Aiken Plateau is one of highly dissected sandhills and xeric vegetation.

Three terraces constitute the Coastal Terrace system within the plant: the Wicomico (below 100 feet), the Sunderland (between 100 and 170 feet), and the Brandywine (between 170 and 270 feet) (Siple 1967). The Wicomico corresponds to the modern floodplain of the Savannah River and is seasonally flooded. Forming the boundary of the Savannah River swamp or floodplain is the Sunderland Terrace which is a flat, mesic area heavily relied upon for agriculture prior to the construction of the plant. The highest terrace, the Brandywine, has been deeply dissected by stream action, but it offers conditions similar to the Sunderland terrace. Generally, the latter two terraces afford excellent conditions for present and past human occupation.

The topography of the study area results from stream activity eroding the plateau and terraces; five major drainage systems account for this landform situation. Upper Three Runs Creek is the largest drainage within the plant and the only one having its headwaters outside of the plant. This stream system is composed of the main branch and four major tributaries: Tinker Creek, Mill Creek, Reedy Branch and Tim's Branch. Approximately 190 square miles of the study area are drained by this system (Fig. 2).

Lower Three Runs Creek forms a drainage divide with Upper Three Runs in the northeast corner of the plant and drains the eastern portion of the area. Much of this stream has been inundated by Par Pond and other smaller ponds in the Popular Forks Branch, Joyce Branch and main branches. The drainage system of Lower Three Runs Creek covers 180 square miles, making it the second largest on the plant. Much of the drainage is, however, restricted to a narrow corridor corresponding to the creek's floodplain about five miles south of Par Pond (Fig. 2).

The three smaller stream systems drain the area southwest of the Upper and Lower Three Runs drainage divide (Fig. 2). All of these streams head near the boundary of the Brandywine Terrace and the Aiken Plateau and drain the terraces. Four Mile Creek, the westernmost of these streams, drains about 35 square miles and flows directly into the Savannah River. Pen Branch, a stream of equal drainage size, flows through the terraces into the swamp where it turns southeast to join Steel Creek prior to entering the Savannah River. Steel Creek has one major tributary, Meyer's Branch, and drains most of the southeast corner of the plant. Its drainage basin is also 35 square miles.

Aydelott (n.d.) has formulated a soil description of the study area for purposes of forestry and general land use planning. The results of this study are summarized in Table 1. The information derived from this study has utility in the examination of the relationship between site

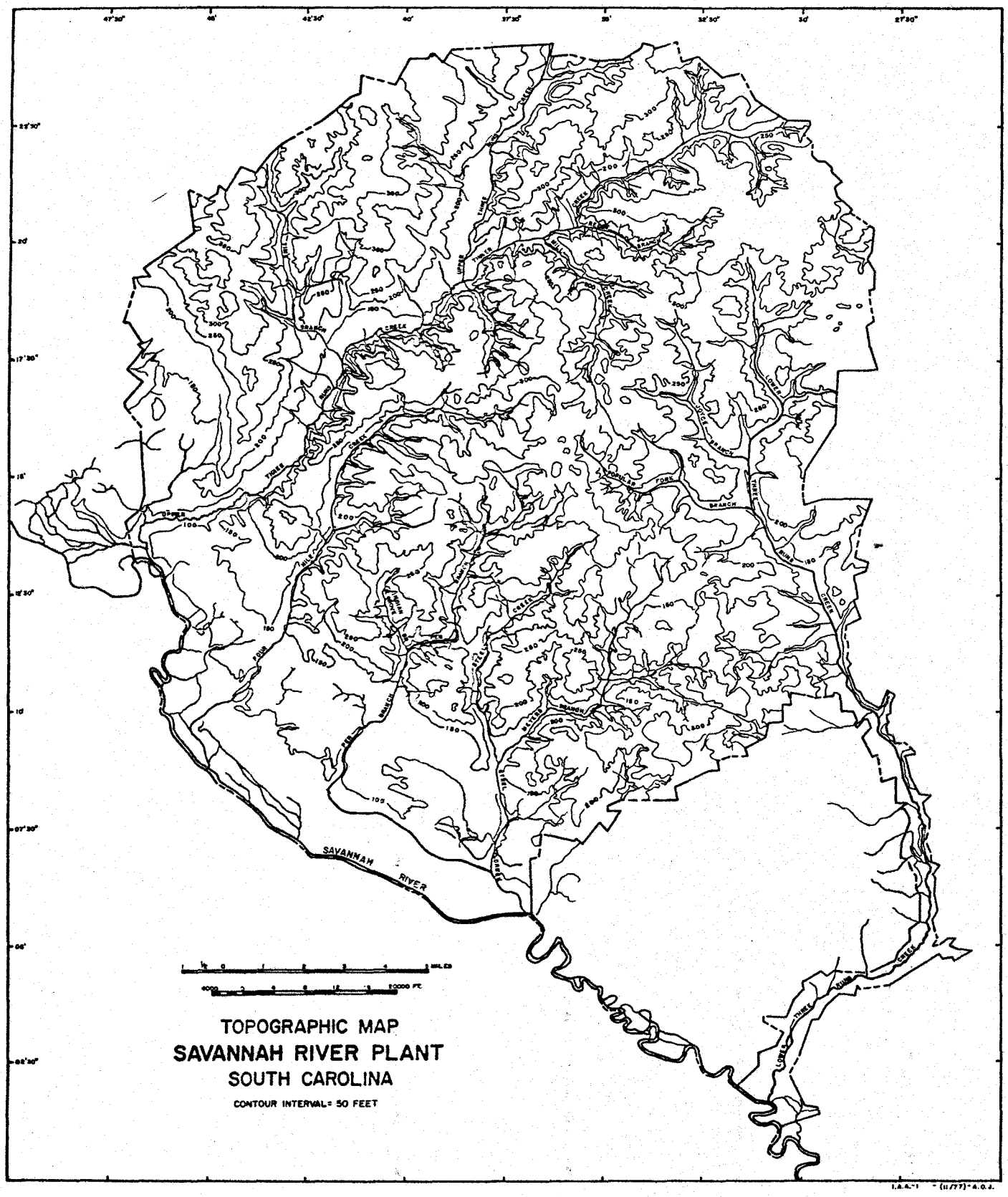

Figure 2: Topographic map of the Savannah River Plant.

TABLE 1 SOIL DESCRIPTIONS AND LANDFORM POSITION

Soil #	Soil Type	Soil Description	Topographic Position (Acreage)
1	Americus Sandy	4-6" dusky red loamy sand over red sand to a depth greater than 60 inches	Upland Ridges (1,151 acres)
2	Vaucluse and Blaney soils	2-4" dark gray sand over 10-20" of pale brown sand, underlain by firm brown sandy clay loam. Soils are very rocky in upper two feet.	Steep side slopes and choppy ridges (13,050 acres)
3	Mascotte Sand	5" of very dark gray sand over 3-10" of gray sand over 2-6" of brittle dark brown sand underlain by 10-15" of gray sand with gray mottled sandy clay loam.	Low flats near Savannah River floodplain (384 acres)
4	Dotham and Norfolk soils	2-4" of dark gray sand with pebbles, over pale brown sand that is underlain by yellowish brown friable sandy clay loam within 24".	Uplands (19,193 acres)
5	Fuquay and Wagram soils	2-4" dark gray sand with pebbles, over 25-40" of pale brown sand which is underlain by yellowish brown sandy clay loam.	Uplands (54,890 acres)
6	Grady and Bayboro soils	8-15" of black loam over gray 'sticky' clay or sandy clay.	Depressions and wet weather ponds (3,838 acres)
7	Johnston and Okenee soils	Up to 30" of mucky loam over dark gray sand, often underlain by sandy loam.	Floodplains and upper stream drains (11,899 acres)
7M	Johnston and Terra Ceia soils	Commonly 3 feet or more of black organic matter.	Floodplains and swampy areas (384 acres)
8	Ocilla and Albany soils	4-6" of dark gray sand over 30 to 60" of brownish yellow sand which is mottled at 30". Underlying material is mottled sandy clay loam.	Low stream terraces, may be subject to seasonal flooding (6,141 acres)
9	Kalmia and Johns soils	4-6" of dark gray sand over pale brown sand that is underlain by brownish yellow friable sandy clay loam at 20 to 40 inches.	Non-flooded stream terraces (6,141 acres)
10	Lakeland and Kershaw soils	2-4" of dark gray sand over 80" or more of yellowish brown sand that is loose and droughty.	High undulating to nearly level ridges (4,222 acres)
11	Orangeburg and Red Bay soils	4-8" of very dark brown loamy sand over strong brown to dark red sand that is underlain by red to dark red friable sandy clay loam at 20 to 40" below the surface.	Upland and side slopes (5,757 acres)
11T	Orangeburg Sandy Loam on a terrace	4-8" of very dark brown loamy sand over pale brown sand underlain by red firm sandy clay loam to sandy clay at 20-30" below surface.	Non-flooded stream terraces (384 acres)

Soil #	Soil Type	Soil Description	Topographic Position
12	Troup Sand	2-4" of dark gray sand over yellowish brown sand that extends to depths of 60 to 80". Underlying material is strong brown to red sandy loam to sandy clay loam	High undulating to nearly level ridges (10,363 acres)
12T	Troup Sand on terrace	6-10" of very dark gray loamy sand over brown to yellowish brown loamy sand that extends to depths of greater than 60".	Old stream terraces not subject to floods (16,890 acres)
13	Leaf and Wahee soils	5-10" of very dark gray loam over 2-10" of brownish gray silt loam, underlain by mottled sticky clay or sandy clay.	Stream terraces subject infrequent floods (1,535 acres)
15	Lucy and Wagram soils	3-6" of dark gray sand over 40-60" of brownish yellow loose sand that is underlain abruptly by red or strong brown sandy clay loam.	High undulating ridges and side slopes (383 acres)
17	Gunter Sand	3-6" of dark gray sand over 40-60" of light yellowish brown sand; gray splotches are common below 20". The underlying material is mottled sandy clay loam often with soft concretions.	High undulating to nearly level ridges (14,969 acres)
18	Osier Sand	3-8" of dark gray sand over light brown and gray sand.	Level to slightly depressed low stream terraces (384 acres)
19	Izagora Sandy Loam	5-10" of very dark gray sandy loam over yellowish brown friable sandy clay loam that contains gray mottles within 30". Within 40 inches the texture turns clay.	Non-flooded stream terraces (3,838 acres)
20	Blaney, Vaucluse, Orangeburg, Lucy and Troup soils	Soils are variable, usually occuring as narrow parallel strips in no regular order. Texture ranges from sands to sandy clays.	Sharp breaks and narrow benches adjacent to drainageways (8,828 acres)
Savannah River Swamp and Lower Three Runs Corridor		Bottomland soils of various types	Wet floodplains (18,887 acres)
Modern Water Surfaces			Ponds and streams (3,070 acres)

TOTAL ACRES = 200,823

(from Ayedelott n.d.)

location and soil type which will be presented in a later section of the report. In general the soils may be divided on the basis of drainage suitability into two major groups: predominantly well and excessively well drained soils and predominately poorly drained soils (Beavers, et al. 1973: 33). Well drained soils are Americus, Vaucluse and Blaney, Dotham and Norfolk, Fuquay and Wagram, Ocilla and Albany, Kalmia and Johns, Lakeland and Kershaw, Orangeburg and Red Bay, Orangeburg, Troup, Troup on terrace, Lucy and Wagram, Gunter, Izagora, and the Blaney, Vaucluse, Orangeburg, Lucy, Troup mixed type. Poorly drained soils associated with low wetlands consist of Mascotte, Osier, Leaf and Wahee, Grady and Bayboro, Johnston and Okenee, and Johnston and Terra Ceia. The latter group usually has a hydric vegetation community; the former tends to have extremely variable vegetation from xeric to mesic.

Vegetation

The modern vegetation distribution in the Savannah River Plant is greatly different from the naturally seeded pre-1700 A.D. distribution primarily because of agricultural clearing prior to 1950 and subsequent reforestation in pine plantation. This overview of the vegetation pattern in the study area is an attempt to characterize the situation which may have existed prior to intensive agricultural usage in the nineteenth century. Both Beavers, et al. (1973) and Langley and Marter (1973) have provided the general community types and spatial distributions of these.

Four basic communities, which are patterned by the availability of water and the productivity characteristics of the soil, have been described; these communities are xeric, mesic, small stream hydric and large stream hydric. Community boundaries are often not clear; however, general associations can be made between the presence of these communities of species and landform patterns. The following will provide a discussion of each community and approximate locations within the study area.

The xeric community varies according to the water holding capability of the sandy soils present within the Aiken Plateau, but can be generally characterized by a scrub-oak community in the driest areas. Referred to as the Xerosere by Shelford (1963: 86-87) this community type contains dominant species of longleaf pine (Pinus palustris), turkey oak (Quercus laevis), blackjack oak (Q. marilandica), post oak (Q. stellata), bluejack oak (Q. conerea), southern red oak (Q. falcata), shortleaf pine (P. echinata), and loblolly pine (P. taeda) (Beavers, et al. 34-35). The longleaf pine dominates with the small oak species forming a tight understory. On the most xeric ridgetops, above 300 feet, the pines are usually quite small. This extremely xeric community occurs most usually at elevations above 300 feet along the crests of ridges with extremely deep sandy soils.

The other extreme of the xeric community is present in rich upland areas with well drained soils. This less xeric community is composed of

general oak-hickory hardwoods: white oak (Q. alba), post oak (Q. stellata), southern red oak (Q. falcata), mockernut hickory (Carya tomentosa), pignut hickory (C. glabra), and loblolly pine (P. echinata). The low understory usually consists of sparkleberry (Ilex spp.), inkberry (Ilex glabra), greenbriar (Smilax spp.), poison ivy (Rhus radicans) and poison oak (R. toxicodendron). This community generally occurs at elevations ranging from 300 to 200 feet, spanning the Aiken Plateau and part of the Brandywine Terrace, and is present on ridges and ridge slopes.

The mesic community occurs along small streams, drainage or ravine slopes, and on the Sunderland and Brandywine Terraces due to the relatively moist soil conditions. Characteristic of this community are white oak (Q. alba), black oak (Q. veluntia), swamp chestnut oak (Q. michauxii), willow oak (Q. phellos), mockernut hickory (C. tomentosa), pignut hickory (C. glabra), water oak (Q. nigra), sweetgum (Liquidambar styraciflua), yellow poplar (Liriodendron tulipifera), persimmon (Diospyros virginiana), sourwood (Oxydendrum arboreum), dogwood (Cornus spp.), ash (Fraxinus spp.), and loblolly pine (P. echinata). The actual composition of these species within the community varies greatly due to successional and soil parameters. Since much of this community was removed for agricultural purposes and replanted in pine monoculture it is impossible to describe it from modern observations. The general statement has been made by Shelford (1963: 87) that succession in this community usually leads to an oak-hickory climax associated with the other deciduous species mentioned.

Hydric communities tend to be restricted to the floodplains of the five major streams in the study area and along the seasonally flooded portion of the Savannah River floodplain. In these places soil conditions are extremely moist with vegetation being referred to as a bottomland hardwood forest. According to Beavers, et al. (1973: 34-35) this community varies between small streams and large streams.

Small stream hydric communities, located in the narrow floodplain areas of all major drainage systems, are typified by sweetgum (L. styraciflua), yellow poplar (L. tylipifera), black gum (Nyssa sylvatica), green ash (Fraxinus pennsylvanica), red maple (Acer rubrum), loblolly pine (P. echinata), and sycamore (Platanus occidentalis) (Beavers, et al. 1973: 34-35). In general the distribution of this community would be above the Brandywine Terrace on Four Mile Creek, Pen Branch, Steel Creek and their tributaries. This community would also occur along the tributaries of Upper Three Runs and Lower Three Runs Creeks.

A large stream hydric community occurs on broad floodplains such as the Savannah River, Upper Three Runs, Lower Three Runs. The lower portions of Pen Branch, Four Mile and Steel below the Brandywine terrace would also have this community. Composition of species varies greatly from the small stream in that oaks predominate. Regularly occurring species include willow oak (Q. phellos), water oak (Q. nigra), cherrybark oak (Quercus spp.), overcup oak (Q. lyrata), nuttall oak (Q. nuttallii), swamp chestnut oak (Q. michauxi), sweetgum (L. styraciflua), green ash (F. pennsylvanica), cottonwood (Populus deltoides), sycamore (P. occidentalis), and red maple (A. rubrum) (Beavers, et al. 1973: 35). An additional variant of the hydric community exists in

the near-permanently flooded portions of the Savannah River floodplain. In this swampy context two species dominate, bald cypress (Taxodium distichum) and tupelo gum (Nyssa aquatica). Three other species also occur on a regular basis, black gum (N. sylvatica biflora), water elm (Planera aquatica), and water ash (F. caroliniana).

In summary the vegetation within the Savannah River Plant can best be described as diverse and predictably variable. The general zonation of plant communities varies according to the character of soils and water. A negative association between plant biomass and elevation seems to obtain within the plant, with the highest biomass occuring in the swampy Savannah River floodplain and the lowest in the extremely xeric uplands above 300 feet. Soils and available water also tend to vary accordingly. From this basic formulation of vegetation communities we may now examine the distribution of key faunal species.

Fauna

The mammalian fauna of the Savannah River Plant have been summarily discussed at great length in numerous published reports (Urbston and Rabon 1972; Wood and Odum 1965; Jenkins and Provost 1964; Golley, et al. 1965). The results of these studies are too comprehensive to include in this report; however, a table of furbearing species found within the plant is included (Table 2). This table provides basic information on the abundance and distribution of the major faunal species commonly found in archeological context.

The major mammal species found in archeological context at Rabbit Mount were white-tailed deer (Odocoileus virginianus), beaver (Castor canadensis), oppossum (Didelphis marsupialis), otter (Lutra canadensis), racoon (Procyon lotor), muskrat (Ondatra zibethicus), rabbit (Sylvilagus sp.), gray fox (Urocyon cinereoargenteus), skunk (Mephitis mephitis), bobcat (Lynx rufus) and dog (Canis familiaris) (Stoltman 1974, Appendix K). All of these are found within the modern plant environment and all but dog and muskrat are common.

Other major fauna present in the Rabbit Mount faunal assemblage are turkey, quail, turtle, bowfin, catfish, and garfish. All of these are noted to occur in moderate to high frequency within the modern plant environment (Langley and Marter 1973: 159-168). The presence of all species known from the only controlled archeological collection in the vicinity would suggest a very similar environment with that at Rabbit Mount during its Late Archaic-Woodland occupation.

If this general similarity can be assumed, then the fauna of the plant area would have provided an abundant resource base for hunter-gatherers. At present the species mentioned above have no real restrictions on their movement within the Savannah River Plant and it also appears that they

TABLE 2: FURBEARERS OF THE SAVANNAH RIVER PLANT
(FROM LANGLEY AND MARTER 1973: 157)

Scientific Name	Common Name	Distribution	Abundance
Urocyon cinereoargenteus	Gray Fox	Terraces and plateau	Common
Vulpes Fulva	Red Fox	Plateau	Uncommon
Procyon Lotor	Raccoon	Terraces and Plateau	Common
Lynx Rufus	Bobcat, Wildcat	Terraces and Plateau	Common
Felix Concolor	Cougar	Terraces	Rare
Mephitis mephitis	Striped Skunk	Terraces and Plateau	Common
Spilogale putorius	Spotted Skunk	Terraces and Plateau	Rare
Didelphis marsupialis	Opossum	Terraces and Plateau	Common
Sylvilagus floridanus	Cottontail Rabbit	Terraces and Plateau	Abundant
Sylvilagus palustris	Marsh Rabbit	Swamp	Uncommon
Sylvilagus aquaticus	Cane Cutter Rabbit	Swamp	Rare
Sciurus carolinensis	Gray Squirrel	Terraces and Plateau	Abundant
Sciurus niger	Fox Squirrel	Terraces and Plateau	Common
Glaucomys volans	Flying Squirrel	Hardwoods	Common
Canis familiaris	Feral Dog	Terraces and Plateau	Uncommon
Ursus americanus	Black Bear	Floodplain	Rare
Castor canadensis	Beaver	Ponds and Streams	Uncommon
Lutra canadensis	Otter	Ponds and Streams	Uncommon
Mustela vison	Mink	Not Known	Rare
Mustela frenata	Weasel	Not Known	Rare
Odocoileus virginianus	Whitetail Deer	Terraces and Plateau	Abundant
Sus scrofa	Feral Hog	Terraces	Common
Ondatra zibethica	Muskrat	Terraces and Plateau	Rare
Peromyscus polionotus	Old-field Mouse	Forbs-Broomsedge	Common
Mus musculus	House Mouse	Forbs-Broomsedge-Hardwoods	Rare
Cryptotis parva	Least Shrew	Forbs-Broomsedge-Vine	Common
Reithrodontomys humulis	Harvest Mouse	Forbs-Broomsedge-Vine	Common
Sigmodon hispidus	Cotton Rat	Forbs-Broomsedge-Hardwoods	Abundant
Neotoma floridana	Eastern Woodrat	Broomsedge-Vine	Uncommon
Peromyscus gossypinus	Cotton Mouse	Hardwoods	Abundant
Ochrotomys nuttalli	Golden Mouse	Hardwoods	Abundant
Oryzomys palustris	Rice Rat	Lowland Hardwoods & Swamp	Common
Pitymys pinetorum	Pine Mouse	Astor-Upland Grass	Common
Blarina brevicauda	Short-tailed Shrew	Forbs-Broomsedge-Pines	Abundant
Sorex longirostris	Southeastern Shrew	-	Common

have suitable habitats in both the upland plateau and lower terrace environments. With this lack of habitat specificity, inferences regarding faunal exploitation patterns must be limited to aquatic species which have a spatially circumscribed habitat. Beaver and otter would also be exploited near the preferred stream habitat.

Beyond these limited statements concerning the distribution of animal species, little else can be argued at present. The potential for examining the structure of the faunal and vegetal resource base within the study area is extremely high, but detailed study will have to be deferred until the next phase of research.

In summary of the environment, the Savannah River Plant area offers a broad range of vegetation and faunal resources which would have been essential during prehistoric occupations of the upper Coastal Plain. This overview of the general environment must be further examined in relation to the nature of archeological resources in future investigations in order to understand the distinctive man-land relations indicated by the prehistory of the Savannah drainage. Such an ecological perspective should yield the greatest opportunity for explicating the causes and mechanisms of changing adaptive patterns suggested by the long human occupation.

ARCHEOLOGICAL BACKGROUND

Within the drainage of the Savannah River below the Fall Line, investigations of cultural heritage from an archeological perspective have been focused on selected areas. For this reason an overview of the prehistory of the area must rely on information selectively investigated without regard for general archeological pattern. This general discussion of the occupational history within the study area and immediate environs will be an attempt to characterize the general prehistory of the Savannah River drainage within the Coastal Plain.

Archeological undertakings of a controlled nature were begun in the latter half of the last century by Thomas (1894) and Moore (1899) in their studies on prehistoric mound sites within river valleys of the eastern United States. These efforts resulted in the location and collection of selected large sites within the Savannah River area; however, these pioneer studies were of value only in documenting the presence of sites within the drainage. They have little value for modern studies beyond that mentioned, but these were the pioneering efforts in the study of the region's archeological resources.

The advent of more scientific archeological research within the area began with the efforts of William Claflin in the vicinity of the Fall Line at Stalling's Island. Claflin excavated a large shellmound on the island within the Savannah River during the 1920's and documented an assemblage of archeological materials indicative of the earliest ceramic complex in the eastern United States (Claflin 1931; Sears and Griffin 1950; Bullen and Green 1970). For this reason the Stalling's Island site has become one of the most important cultural resources known from the Southeast and has been subjected to intermittent investigations since Claflin's first study (Fairbanks 1942; Sears and Griffin 1950; Bullen and Green 1970).

In the delta region of the Savannah River, Antonio Waring was instrumental in the initial understanding of the prehistoric archeological record. During his brief life, Waring through cooperation with various archeologists recorded, collected and/or excavated almost all of the key archeological sites which would form the foundation of all future archeological research in the Savannah, Georgia area. Waring and others were responsible for the description of the basic ceramic types and general ceramic complexes such as the Deptford ceramic complex (Waring and Holder 1968), Woodland and Mississippian ceramic types (Caldwell and Waring 1939), and early Woodland ceramic types and assemblages (Williams 1968: 152-215). The summary of Waring's work provided by Williams (1968) stands as a major contribution to the study of Savannah River prehistory.

Other research in the Savannah, Georgia area was conducted during the W.P.A. period on the Irene Mound site, a Mississippian period site. Conducted over the course of several years, the excavations revealed the presence of a long-term occupation associated with a ceremonial center (Caldwell and McCann 1941). These excavations yielded the first thorough

plan of such a ceremonial complex within the Atlantic Coastal area and extended the known archeological record into proto-historic times.

Subsequent research was delayed for almost two decades, until the 1960's when renewed interest in the initial ceramic period prompted the work of James Stoltman at Groton Plantation (Stoltman 1974). This research project involved the survey and test excavation of sites within the plantation for purposes of exploring the development of Late Archaic and Woodland cultures in the riverine area of the Coastal Plain. The major outcome of this research was the excavation of two sand mounts, shell middens containing some of the earliest ceramics known for North America, Rabbit Mount and Clear Mount. In addition, sites representative of Archaic, Woodland and Mississippian occupations were located in the survey, and the distribution of these sites suggested to Stoltman (1974:229-244) radical differences in subsistence and settlement practices at various times.

Following Stoltman's research, Drexel Peterson (1971) intensified the survey of the Groton Plantation area in order to refine specific hypotheses regarding ceramic chronology and cultural development. The general result of this study was the discovery that changes in subsistence strategies were not appreciable during the Woodland period, as was thought by Stoltman (1974). Another result was a ceramic chronology which included several additional "phases" during the Early Woodland period and later times. These latter results have yet to be substantiated from other research in the general area.

Concomitant with the latter research was the expansion of study in other areas of the Savannah drainage. This research includes survey and excavation at White's Mound (Phelps and Burgess 1964; Phelps 1968), Hollywood Mound (DeBaillou 1965), the Theriault site (Brockington 1971), Mississippian sites along the Savannah River (Ferguson, personal communication), the Augusta area (Ferguson and Widmer 1976), and recent work at Stalling's Island (Bullen and Green 1970). The combined results of these research efforts and those of individuals working earlier form the basis for the present understanding of prehistoric development within the Savannah River valley below the Fall Line. Although a synthetic overview of the prehistory of the area is as yet unwritten, the initial foundation exists for general formulations. The following summary of the occupational history within the lower Savannah River is only intended to serve as a general chronological model for use in comparing the initial results of the Savannah River Plant reconnaissance (see Table 3).

Paleo-Indian (9,500 - 8,000 B.C.)

The Paleo-Indian period is represented throughout North America by an archeological assemblage indicative of a hunting and gathering economy based on the exploitation of large, now-extinct fauna. Due to geological

TABLE 3

A GENERAL OCCUPATIONAL SEQUENCE FOR THE SAVANNAH RIVER BELOW THE FALL LINE

CULTURAL PERIOD	TIME SCALE	PHASE	DIAGNOSTIC ARTIFACT CLASSES
Historic	present		Mass-produced ceramics, glass, metal, frame and brick architecture
	1700 A.D.		
		Irene	Irene filfot stamped, incised & plain ceramics, small triangular projectile points, Southern Cult objects
Mississippian	1200 A.D.		
		Savannah II	Savannah complicated stamped, plain & burnished ceramics, small triangular points
	1000 A.D.		
Late Woodland		Savannah I	Savannah cordmarked & burnished ceramics, small triangular projectile points
	700 A.D.		
Middle Woodland		Wilmington	Wilmington cordmarked ceramics, large triangular projectile points
	1 A.D.		
		Deptford	Deptford linear check stamped, simple stamped and check stamped ceramics
Early Woodland	500 B.C.		
		Refuge Thom's Creek	Simple stamped, punctate & incised ceramics (sand tempered)
	1000 B.C.?		
		Stallings III	Savannah River projectile points, decorated fiber tempered ceramics
Late Archaic		Stallings II	Savannah River projectile points, plain fiber tempered ceramics
		Stallings I	Savannah River projectile points
	3000 B.C.		
Middle Archaic		(No specific phases)	Guilford points Morrow Mountain points Stanly points
	5500 B.C.		Kirk points
Early Archaic		(No specific phases)	Palmer Dalton
	8000 B.C.		
Paleo-Indian		(No specific phases)	Quad points Suwanee points Clovis points
	10,000 B.C.		

Based on Stoltman (1974), Ferguson and Widmer (1976), Michie (1977) and Coe (1964).

conditions following this Pleistocene adaptation, the recognition of Paleo-Indian sites is difficult. Holocene changes in stream hydrology have resulted in the deposition of recent sediments on many localities believed to be favored by these early hunter-gatherers (Michie 1977). Evidence for Paleo-Indian occupation has however, been recovered from surface contexts throughout the associated Coastal Plain of Georgia and South Carolina (Michie 1977; Waring 1966; Waddell 1965; Stoltman 1974:10) and from the Theriault site on Brier Creek in Georgia (Brockington 1971). Although complete assemblages have yet to be found in association with the diagnostic fluted points typical of all of the above localities, the presence of the points would suggest some activity within the region during the latter portions of the Pleistocene.

Michie's (1977) study suggests a general model for the location of Paleo-Indian sites within the Coastal Plain based on the locations of 100 fluted points. He concludes that

> The overall pattern of projectile point distribution seems to involve the larger river systems [of South Carolina]; such as the Broad, Savannah, Saluda, Santee, Wateree, PeeDee, Congaree, and the smaller Edisto Rivers. When these rivers are involved with point distributions and locations, the points usually occur at the intersection of creeks and the river's floodplains and on the highest portion of land near that intersection (Michie 1977:92).

Given this, one would expect sites of this period to occur within the boundaries of the study area near the confluences of the major tributaries (Upper Three Runs, Four Mile, Pen Branch, Steel and Lower Three Runs); however, their presence is probably obscured by alluvial sediments of great depth.

Early Archaic (8,000 to 5,500 B.C.)

The Early Archaic represents the initial response of prehistoric inhabitants of the Coastal Plain and North America, in general, to the ameliorating climatic conditions of the Holocene. The changes in climate and associated vegetation patterns and faunal populations during the immediate post-Pleistocene provided a much more suitable enrivonment for human population growth. Hunting and gathering resources were more plentiful due to this change from a cooler climate to a milder climate with increases in deciduous nut and seed-bearing vegetation. Although variation occurred in this Holocene climatic sequence, the general present-day character of the Coastal Plain was beginning to develop at this time.

Archeological evidence of the earliest Holocene hunter-gatherers is composed of the presence of Dalton-Hardaway (Goodyear 1974; Coe 1964) occupations throughout the eastern United States. Assemblages associated with the Dalton-Hardaway point type are generally diverse with functional

specificity indicated in tool form. The locations of sites of Dalton-Hardaway association in the Coastal Plain of Georgia have been examined by Fish (1976:22-23), who suggests a strong association between large stream systems and these Early Archaic types.

Following the Dalton-Hardaway, the Palmer point represents the latter portion of the Early Archaic period. Palmer points have been recorded from throughout the state of South Carolina and adjoining states within the Coastal Plain and Piedmont physiographic provinces. Materials recovered from the nearby site of Cal Smoak in the Edisto drainage (Lee and Parler 1972; Anderson, Lee and Parler n.d.) suggest a clear stratigraphic priority of Palmer occupations relative to Kirk and other Middle Archaic forms. This and other Palmer components from the Fall Line and Coastal Plain (Michie 1971; Coe 1964) suggest strong associations with large stream systems, although in the Piedmont, House and Ballenger (1976) and Goodyear (1978) indicate an extensive upland, ridge top association for small Palmer components. These results may indicate a much more widespread occupation and diffuse land use pattern related to a broad spectrum subsistence base during the latter portions of the Early Archaic. However, this and any other inference for the period within South Carolina must await evaluation through excavation and more intensive analysis.

To generally characterize the Early Archaic period it must be mentioned that the evidence is indeed minimal, at best, for the Coastal Plain. Dalton-Hardaway and Palmer occupations are surely present based on the common occurrence of projectile points, but associated assemblages are as yet poorly understood. Distributional studies (Goodyear 1978; Goodyear, Ackerly and House n.d.) indicate a wide ranging land use pattern, which is suggested to relate to the exploitation of deer in the uplands and riverine resources in major drainages of the Piedmont. This general settlement pattern may be the case in the Piedmont. Due to the relative absence of good distributional studies in the Coastal Plain, one can only posit that Early Archaic sites in the Savannah River Plant will conform to the pattern of environmental resouces available to hunter-gatherers.

Middle Archaic (5,500 to 3,000 B.C.)

This period is characterized by an inferred continuance of a generalized hunting and gathering subsistence pattern with differences being indicated by changes in projectile point morphology. Four point forms are typical of this period: the Kirk, Stanly, Morrow Mountain, and Guilford types (Coe 1964). The common distribution and density of these point forms throughout the Coastal Plain and Piedmont would suggest a greater population and extensive pattern of land use. With the exception of Lake Spring (Miller 1949), Theriault (Brockington 1971) and Cal Smoak (Lee and Parler 1972), few sites in the general area of the Savannah River Plant have been excavated with evidence of the Middle Archaic. Little is known of the Middle Archaic assemblage for the Coastal Plain region aside

from the ubiquitous hafted bifaces (i.e. projectile points).

Within the context of the Savannah River Plant no specific predictions for sites of this time period can be made other than they may be expected to occur in almost any environment with moderate resource potential. Thus one would expect them to be found within the terrace system and within the riverine and upland portions of the Aiken Plateau.

Late Archaic (3,000 to 1,000 B.C.)

Within the prehistoric sequence of the Savannah River valley, the Late Archaic is perhaps the best examined cultural period due to its importance in understanding the initial development of ceramic technology in North America. Stoltman (1972, 1974) has synthesized the most recent information available on the Late Archaic in the Savannah drainage and has suggested a riverine adaptation focused on shellfish with some upland utilization. The period is most commonly recognized by the presence of the Savannah River projectile point type, which is a large, broad-bladed, stemmed point.

Data representing this period have been excavated from 24 sites along the Savannah River from the lower Piedmont to the Atlantic Ocean. These sites are discussed by Stoltman (1972) in great detail, especially with reference to the presence of fiber-tempered pottery. Among the more important of these sites, because of the availability of radiocarbon dates, are Stalling's Island (Claflin 1931; Fairbanks 1942; Bullen and Greene 1970), White's Mound (Phelps and Burgess 1964), Rabbit Mount (Stoltman 1974), Bilbo (Williams 1968:152-197), Dulany (Williams 1968), and Sapelo Island (Williams 1968). Other sites include Refuge (Williams 1968:198-208), Lake Spring (Miller 1949), Chester Field (Williams 1968:208), Daws Island (Hemmings 1972), Walthour (Caldwell 1952:314), Meldrim (Williams 1968:182-183), and Oemler (Williams 1968: 182-183).

Associated with these sites is a variable lithic industry best represented at Stalling's Island, Rabbit Mount, Bilbo, and Lake Spring (Stoltman 1972:45). The raw materials range from slate to chert depending on the local availability of these materials. Savannah River points predominate the assemblage with numerous unifacial tools, cobble tools, large nonhafted bifaces, steatite "netsinkers," bannerstones, and steatite bowls (Stoltman 1972: 46-47). This diverse assemblage of tool types is complemented by various antler, bone and shell tools found at Rabbit Mount and Stalling's Island (Stoltman 1972).

The presence of fiber-tempered ceramics at sites of the Late Archaic is restricted to what Stoltman (1974:19) refers to as the Stallings II and Stallings III phases. Basically, these two phases are distinguished by the presence of decorated fiber-tempered sherds in Stallings III and the presence of only plain fiber-tempered ware in Stallings II times. Stallings

I has basically the same assemblage as the other two phases except that it lacks ceramics.

Based on the distribution of sites for the Late Archaic there does not appear to be a major distinction in settlement patterns between the three phases; indeed, the phases may be simply taxonomic distinctions based on ceramics without any relevance to settlement or subsistence patterns. As in the other Archaic periods, sites tend to focus on large drainages and are often found within the floodplains of rivers on alluvial rises or mounts. Shellfish were heavily utilized as were mammalian fauna (Stoltman 1974). Excavation of sites has focused on the large shell bearing locations which may be large riverine base camps, but little information is available for upland Late Archaic sites. Due to the presence of a broad range of fauna at Rabbit Mount (Stoltman 1974), one would expect to find evidence of Late Archaic exploitation in diverse environments of the Savannah River Plant. However, the largest sites of this affiliation would be expected within the Savannah River swamp on sand ridges or along the edges of the swamp on the Sunderland Terrace.

Early Woodland (1,000 B.C. to A.D. 1)

The Woodland period has been defined by Willey (1966) as a general period during which ceramics, burial mounds and agriculture were common; however, this definition is primarily one based on artifactual traits, the most common of which is ceramics. As mentioned in the description of the Late Archaic, ceramics are known from the Savannah River area well before the 1,000 B.C. date given here. Stoltman (1974:20-21) simply states that the Early Woodland is defined on the basis of sand tempered ceramics for the region, in the absence of definitive proof of mounds or agriculture. For this reason, the use of the term Woodland is useful only as an heuristic device for relative chronological purposes. The discussion of the various Woodland phases which follows will provide a general understanding of the variation in ceramic style and settlement patterns associated with the ceramic time indices.

Determination of the exact starting dates for the Early Woodland period in the Coastal Plain area has been confused by similarities between many of the fiber-tempered and sand-tempered wares. The major problem arises with the Thom's Creek/Awendaw types, which are sand tempered, punctate design types similar to the fiber tempered Stallings III ceramics. Other designs common on these ceramics are simple stamping and incising (Phelps 1968). South (1973) has grouped these Thom's Creek ceramics and those of the later Refuge complex into a Formative ware group association with those of the Stallings II and III phases. This latter grouping may best characterize the general transition between the two groups of ceramics since the only real basis for separation is the fiber temper/sand temper attribute. Ceramics of both temper types occur within Rabbit and Clear Mount at Groton Plantation in similar contexts furthering the contention

that the sand-tempered types are transitional (Stoltman 1974:215).

Within the Savannah drainage system the locations of Thom's Creek and Refuge sites appear to be similar to those of the Late Archaic. Stoltman (1974:215, 236) has mentioned that the Early Woodland ceramics occur in both floodplain-terrace and upland associations. This general pattern would seem a reasonable expectation for the Savannah River Plant because of the approximately similar environmental contexts in the two localities.

Beyond the ceramic assemblages little is really known of the Thom's Creek and Refuge phases, especially in terms of lithic artifacts. This paucity of information makes any inferences concerning the first half of the Early Woodland weak at best. The overall similarity between Stallings sites and Thom's Creek/Refuge sites may be some evidence to support a functional similarity argument although this is only conjecture at this time.

Deptford phase evidence, in contrast to the preceding phases, has been recovered from sites on the Atlantic and Gulf Coastal Plains from North Carolina to Florida to Alabama. Milanich (1972) has provided the most comprehensive examination of the Deptford phase throughout its geographic range. This study views the Deptford phase as a non-agricultural based economy dependent on intensive hunting and gathering. This phase is most readily identified in the archeological record by sand-tempered ceramics with linear check stamped, simple stamped, and check stamped designs (Milanich 1972; Caldwell and Waring 1939).

Within the Savannah River region, Deptford is well represented by evidence from the Bilbo Site (Williams 1968:152-197), the Deptford Site (Williams 1968:140-151), the Refuge Site (Williams 1968:198-208), White's Mound (Phelps and Burgess 1964), and the Groton Plantation sites (Stoltman 1974; Peterson 1971). The majority of information concerning the Deptford phase in the Savannah River region concerns ceramics with only minimal reference to the associated assemblages. The only general associations present at these sites are small triangular projectile points, small stemmed projectile points, shell and bone ornaments and tools, and assorted flake tools. This limitation in the information base for assemblages of Deptford can be traced to a rather single minded concentration of most investigators on the ceramic development of the Deptford ware group with little attention to the other characteristics of the assemblage. Milanich (1972) must be credited with one of the only efforts directed at the reconstruction of the entire lifeway associated with the Deptford ceramic pattern; however, much of his information and results are focused on the coastal region and the Gulf sub-region which are far removed from the Savannah River.

The spatial distribution of Deptford sites has been investigated at Groton Plantation with the conclusion that the Deptford ceramic sample is distributed equally between the floodplain and upland (Stoltman 1974:237). This pattern of increased use of the uplands is believed to correlate with an increasing dependence on the biotic resources of non-floodplain environments. Thus, one may expect to find Deptford ceramic sites in the areas of the plant removed from the swamp, such as the terraces and along

the major streams.

In summary of the Early Woodland it can be stated that there is a stylistic change in ceramic design which is correlated with a general change in settlement pattern. This period is one of transition from the floodplain oriented subsistence base in the Late Archaic to the more diffuse subsistence base in the Woodland evenly distributed in most environmental contexts.

Middle Woodland (A.D. 1 to 700)

Most cordmarked ceramics with sand temper are included in the Wilmington Cord Marked (or Wilmington Heavy Cord Marked) type described Caldwell and Waring (1939) and Stoltman (1974). Although sherd temper is considered to be a major attribute of this type (Caldwell and Waring 1939), Stoltman (1974:25) argues that sand tempering can be considered within the range of temper variability for the type since all other characteristics of the ceramics found at Groton Plantation fit the description. Basically then, Wilmington is identified by a predominance of coarse cordmarked ceramics within the Savannah River area.

Sites which are reported as containing Middle Woodland ceramics within the Savannah drainage are known from the mouth of the river to the Fall Line. These include Oemler, Walthour, Meldrim, Cedar Grove, Deptford Bluff, Greenseed Field, King's New Ground Field, White's Mound, Rabbit Mount, Clear Mount, and several others in Groton Plantation (Stoltman 1974: 24-27). Information from these sites concerns primarily ceramics with the notable addition of mound associations (Stoltman 1974) in several cases. Within the Groton Plantation survey the majority of the ceramic sites occurred within the upland province in contrast to the preceeding periods.

Little is known of the assemblages associated with the ceramics of this phase, but inferences from the Groton study allow for some understanding of the general settlement pattern. Stoltman (1974:214-215, 236-241) concludes that since almost 80% of the Wilmington ceramics recovered in the survey were found in the uplands, a concentration on upland resources was the base of the subsistence technology including some form of slash and burn agriculture. Although this is a conjecture based on minimal evidence, the strong association of these ceramics in the non-floodplain environment would indicate some type of shift in settlement and possibly subsistence patterns. If this is the case, then the Middle Woodland should be a well represented period within the plant because of the large area of upland composed of terraces and the Aiken Plateau.

Late Woodland and Mississippian (A.D. 700 to 1,700)

These two general periods have been combined for purposes of this summary because of a general lack of distinction between the ceramics of the Savannah I and Savannah II phases in the area of the study. The diagnostic ceramic type of the Savannah I phase is Savannah Cordmarked (or Savannah Fine Cordmarked) defined by Caldwell and Waring (1939), while Savannah Complicated Stamped, Savannah Check Stamped and Savannah Burnished Plain are considered as diagnostic of the later Savannah II phase (Stoltman 1974:27-31). The problem arises from the lack of exclusiveness in the two ceramic distributions, i.e. Savannah Cordmarked occurs almost always with the latter types. Thus from about A.D. 700 to 1,200 the Savannah ceramic wares predominate without a great deal of distinction.

The Savannah phases are documented at sites from the Fall Line to the Atlantic coast. Hollywood Mound, which was excavated partially by DeBaillou (1965) and Thomas (1894), is located near Augusta, Georgia, on the Savannah floodplain. The site contains all types of Savannah ware ceramics associated with a large, multi-staged temple mound (DeBaillou 1965:6-10). Although other sites with Savannah ceramics are known from the middle Savannah River, only Lawton Field (Moore 1899) has any published documentation. In the vicinity of the city of Savannah, Georgia, the work of Waring and subsequent research during the W.P.A. period has yielded several sites of this Late Woodland-Early Mississippian period.

Deptford, Haven Home ("Indian King's Tomb"), and Irene are the best documented of these estuary region sites. Due to the rich cultural deposits contained within these sites, (e.g. burials, grave goods, whole vessels, mounds, beads, and other exotic material culture), the information base is much better than for earlier periods. The first two sites mentioned, Deptford and Haven Home contain a limited series of Savannah ceramics and are used by Stoltman (1974:27-29) to characterize the Savannah I phase. Both sites contain burials and large accumulations of artifactual debris. Only the Savannah cordmarked and burnished types occur at these sites, in association with earlier Wilmington ceramics. Unlike most earlier sites Haven Home and Deptford contain numerous burials indicating a more concentrated mortuary practice than was previously known for the Savannah area. This development appears to be continued and elaborated in the following phases.

Research by Moore (1899) and Caldwell and McCann (1941) has revealed the nature of development in the Mississippian culture at the Irene site. This complex mound center documents the ceramic chronology from Savannah phases through the Irene phase. Within the eight construction episodes at the Irene temple mound ceramics of the Savannah phases are present in all levels, being gradually replaced by Irene ceramics in the final stages of the occupation (Caldwell and Waring 1939; Caldwell and McCann 1941:43-46). Associated artifact assemblages for the Savannah phase occupation at Irene

are unclear because of the pre-excavation disturbance at the site. Thus one is faced with only a ceramic type description of the Late Woodland-Early Mississippian time period consisting of the Savannah ware of complicated stamped, check stamped and burnished sherds. Since only ceremonial sites have been excavated, any distributional inference would be misleading except to note Stoltman's comment that there was a "trend toward population nucleation (near floodplains)" (1974:243). One may add to this the increased occupation of the estuarine area surrounding the mouth of the Savannah.

The Irene phase has received greater attention in recent times along the coastal area of Georgia (Pearson 1977; Caldwell 1971). This phase has until most recently been defined by ceramics and mound complexes (Caldwell and McCann 1941; Caldwell and Waring 1939). Diagnostic ceramic indicators of this final Mississippian phase in the Savannah region are Irene filfot stamped, Irene plain and Irene incised (Caldwell and Waring 1939). Associated with these ceramics are mounds, flexed burials, shell ornaments, and some artifacts typical of the Southern Cult, a pan-Southeastern ceremonial complex of late Mississippian times. At Irene evidence of subsistence reflects a reliance on corn, large mammals, fish, shellfish and avifauna (Caldwell and McCann 1941).

Pearson's study of the coastal Irene settlement-subsistence pattern offers insight into the diverse subsistence base during the late Mississippian on Ossabaw Island (1977). The general results of the study indicate a structured settlement hierarchy composed of four site classes which correlate strongly with access to diverse environmental-resource zones. Smaller sites were associated with areas of less environmental variability while the large sites were located to provide maximal access to multiple resources (Pearson 1977:96-98). Although this study examines an island-estuary situation, the value of the results is that the nature of late Mississippian settlement is more complex than the situation suggested by earlier results. In the context of the Savannah River drainage, Irene phase sites must be examined with respect to diverse settlement structure and complex subsistence strategies.

In summary of the prehistoric occupational history in the Savannah drainage system it is possible to outline a basic cultural progression beginning with specialized hunter-gatherers (Paleo-Indian) and culminating with complex agriculturalists (Irene). This trend appears to be similar to those occuring elsewhere in the Eastern United States (Ford 1974; Griffin 1967). Development seems to be due to a feedback relationship between population and potential resources leading to ever more increasing intensity in subsistence strategies. Related to these changes are those of more complex social networks, which allowed for adjustments of problems stemming from perturbations in environmental stability and social interaction. Thus we can inspect the evolution of general patterns of social cultural change within the context of the prehistory of this natural region of the lower Savannah River basin.

Historic Period (post-A.D. 1,700)

The European presence in the Savannah River drainage above Savannah, Georgia began in the early 1700's with the initial settlement of Purrysburg and New Windsor (Meriwether 1940). Prior to these settlements the area was traversed by traders and trappers in pursuit of hides for the English market. The earliest settlements in the drainage were agricultural and were usually charter communities such as Purrysburg and New Windsor. Such towns were founded with the purpose of establishing colonial footholds in relatively unsettled areas following the initial trading and military establishments.

Initial military occupation of the area near the Savannah River Plant is represented by Fort Moore which was established in 1716 (Polhemus 1971). At this location a small garrison was established for purposes of deterring Indian aggression and in order to establish a secure base for settlement. In the 1730's George Galphin established a trading post in the vicinity of Silver Bluff on the Savannah River (Neill 1968) for purposes of trading with the local Indians. This trading post succeeded until the end of the eighteenth century.

The establishment of Purrysburg, in the general area of present Jasper County, and New Windsor, on the present site of North Augusta, South Carolina, occurred during 1735 and 1734, respectively. These towns functioned as frontier towns providing basic mercantile facilities to inhabitants and traders in the Savannah area (Meriwether 1940) and logistical support for the gradual settlement of the drainage between them. During the latter half of the eighteenth century, small agricultural homesteads were established along the river and major tributaries as documented by the Mouzon map of 1775. As markets for agricultural produce were established in Savannah and Charleston, land usage in this area intensified during the first half of the nineteenth century. Mills' Atlas (1965) indicates the presence of widespread occupation throughout the Barnwell District which encompasses the entire area of the modern Savannah River Plant. By this time roads connected all major and minor settlements providing ready access to markets.

Following the Civil War the major plantations of the Savannah drainage were reduced in scale and a pattern of rural settlement became common in the Coastal Plain and has remained so until the present. Large land holdings were partitioned into sharecrop farms and the importance of cotton began to diminish as an economic foundation. The towns of Ellenton and Dunbarton grew during the post-Civil War period until the construction of the plant when both were abandoned with Ellenton's population relocating north of the plant at New Ellenton.

In summary of this historic review, the information contained in this section is intended only as an introductory statement of general trends which transpired during the Anglo-American presence in the general area of the plant. Much more historical research must be conducted prior to a thorough historical overview of the project area and environs. This will be conducted during the next phase of cultural resource research.

FIELD AND LABORATORY METHODS

Field Methods

Archeological research on the Savannah River Plant was initiated during 1973 for the purpose of providing the Department of Energy (previously the Atomic Energy Commission, and Energy Research and Development Administration) with a preliminary inventory of archeological resources within the plant boundaries, in partial compliance with Executive Order 11593. This research has proceeded through three field seasons. Methods employed during each field season will be discussed separately in order to provide a basis for evaluating the coverage and extent of the reconnaissance.

Field Methods - 1973-1974

Initial field reconnaissance on the plant was undertaken during the winter of 1973 and 1974 under the supervision of John Combes with David Miller as an assistant. Surface inspection of the plant was performed in two major areas. First, an area between the Savannah River swamp and South Carolina Highway 125 was inspected in a cursory manner with emphasis placed on the confluences of the major streams with the swamp. The methods involved a spot check procedure, which was selective in scope and intensive in practice. Only areas suspected of yielding sites were inspected following the example of the survey of Groton Plantation done by Stoltman in the 1960's (Stoltman 1974). Also, the margin of the Sunderland terrace overlooking the swamp was partially inspected yielding some archeological sites. Second, an area corresponding to the sandy uplands of the Aiken Plateau to the north, east and south of Par Pond was examined partially. Again stream associations were inspected as well as known locations of late historic cemeteries. The reconnaissance in this latter area was cursory with specific attention being paid to locations with expected high site probabilities.

The net result of the first reconnaissance consisted of a general examination of the Sunderland Terrace and the Aiken Plateau to determine the presence of large and obvious archeological sites and historic cemeteries. Field methods consisted of selective inspection of cleared road surfaces and disturbed ground areas at predicted locations. In all cases where sites were encountered information regarding site size, type, content, location and condition were recorded on standard Institute of Archeology and Anthropology site survey forms. Collections from the site were gathered for laboratory analysis to determine the age and possible function of the sites; however during this phase of research little attempt was made to collect specimens in a controlled, unbiased manner. Thus the samples from the sites recorded during this season are biased toward diagnostic artifact

types. All collections were returned to the Institute of Archeology and Anthropology laboratory for cataloging and later analysis.

The basic result of this first reconnaissance was the accumulation of information and records for five sites in Aiken County (38AK34, 38AK35, 38AK36, 38AK56, and 38AK57) and twenty-seven sites in Barnwell County (38BR8, 38BR9, 38BR13 through 38BR19, 38BR31 through 38BR33, 38BR35 through 38BR49). In total 32 previously unrecorded sites were recorded with sufficient detail for analysis. These sites and related information formed a partial basis for subsequent study.

Field Methods - 1974-1975

Due to a moderate success with the previous reconnaissance and realities of reconnoitering the entire plant, a second season of field work was funded by the Department of Energy (then Energy Research and Development Administration). Again John Combes acted as the Principal Investigator with David G. Anderson and Robert Asreen conducting the bulk of the actual field inspection. The area chosen for this phase of the reconnaissance is the large tract north and east of South Carolina Highway 125 and west of Par Pond.

Fieldwork focused on the systematic inspection of all cleared ground within the central area of the plant with special consideration of the middle reaches of Upper Three Runs Creek, Four Mile Creek, Pen Branch, and Steel Creek. Unlike the initial portion of the study, this phase of field research involved the rigid adherence to systematic procedures of on-the-ground examination which attempted to inspect all possible classes of landform and environmental contexts. This procedure consisted of the perusal of all disturbed ground surfaces such as paved road margins, unpaved roadways, logging roads, small trails, logged areas, and controlled burn areas. The actual process of inspection consisted of a "leap-frog" tactic in which one person began survey at a given location on a road while the other drove ahead to a predesignated distance and began surveying. In this manner the entire road and disturbed ground areas of the study area were covered without repetition.

Sites were recorded using the standard Institute of Archeology and Anthropology site survey form with emphasis being placed on ascertaining information relating to site extent, depth, content, landform position, soil type, and general vegetation. Collections of artifactual materials were controlled in the sense that all visible materials attributable to human manufacture were collected regardless of size or obvious importance as temporal indices. These unbiased collection procedures will allow for more accurate representations of the site's function and aid in assessing the nature of specific activities conducted at the site. In those cases where only partial ground surface visibility would not permit a substantial collection of anticipated materials, shovel test excavations were done to permit supplemental collections.

Results for this second field season were more substantial than the previous research because of the increased level of inspection. In total 162 discrete archeological sites were recorded by Anderson and Asreen. In Aiken County sites consisted of numbers 38AK60 through 38AK130 and 38AK136 through 38AK171 and in Barnwell County of numbers 38BR54 through 38BR113. This quantum increase in the number of sites recorded can also be attributed to the level of inspection and the somewhat altered specifications used in determining a site. In the second phase a site was defined as a location which offered artifactual or structural evidence of past human occupation or behavior so that many more small sites were recorded. The purpose of this change in definition was to determine the range of variability in site size and type within the diverse environments of the plant.

Field Methods - 1977

This portion of the initial reconnaissance was conducted under the direction of Glen T. Hanson with the assistance of Rachel Most. Based on the results of the second phase of research and the suggested sampling bias in the first phase, this last field study was aimed at acquiring a more representative sample of those areas examined by Combes and Miller in 1973-1974. Following the exact methods of field inspection developed in the second season, the Sunderland and Brandywine Terraces and the area northwest, north, east and south of Par Pond were investigated. Roads and trails formed the principal survey units as in the 1974-1975 season with all cleared ground surfaces being closely scrutinized for artifactual debris. Recording of located sites followed the same procedures mentioned for the second field season.

In this general manner all areas of the plant were covered during the second and third seasons of field activity with the exceptions of the Savannah River Swamp, the narrow federally controlled area along the channel of Lower Three Runs Creek south of S.R.P. road A-18, and other areas which were covered with water (i.e. swamps along streams). All materials were returned to the Institute of Archeology and Anthropology, cataloged and subjected to preliminary analysis.

In total, the third field season of preliminary reconnaissance resulted in the location of recording of 110 discrete archeological sites. Sites 38AK221 through 38AK228 were recorded in Aiken County, and sites 38BR150 through 38BR247 were recorded for Barnwell County. These sites in combination with those defined in previous stages of the study provide the basis for the following discussions of site location, characteristics and chronology.

Field Methods - Summary

Field methods during this project were by no means as thorough and comprehensive as would be desirable in any inspection of such a large land area as the Savannah River Plant. The purpose of the field tactics was to provide a general inventory of sites within the plant without major bias in the inspection procedure. The sampling strategy utilized throughout the fieldwork may be best called "opportunistic" in that the survey took advantage of the windows provided by ground surface disturbance.

Within the plant more than 85% of the area is covered by dense hardwood forest, pine plantation, swamp, or standing water producing rather unsuitable conditions for locating cultural resources long since passed into ruin. This dilemma of poor visibility was considered well in advance of the latter two field seasons, especially with the thought of providing the project with a representative sample of the resources. Since most of the literature on regional sampling involves the rather sparsely vegetated region of the Southwest (e.g. Matson and Lipe 1975; Judge, Ebert and Hitchcock 1975; Mueller 1975), it was of little use in resolving the logistical problems offered by the woods of the Savannah River Plant. Ideally, rather sophisticated sampling designs could have been implemented in this study but the real cost per unit area covered would have been prohibitive. Thus, the conveniently located system of roads and trails within the plant were viewed as an optimal solution to the problem of inspecting diverse areas of the plant within the financial limits of the funding source.

Figure 3 indicates the distribution of sampled roads and areas within the study area, the Savannah River Plant. When viewed as sample transects these roads cover all topographic features and sedimentological features within the plant; and they also cross-cut the general vegetation communities discussed in the environmental section of the report. This diverse coverage of major environmental strata would therefore appear to provide at least a minimal representation of the potential locations of human land use except for the inundated swamps and lakes. Given the overall expectations of an initial reconnaissance, it is felt that the sample has provided a relatively unbiased glance at the geography of the plant and provided an approximation of the range of site types and site locations present within the plant boundaries.

In summary of the general field methods a number of specific points are worth mention, especially for purposes of evaluating the level of coverage as a basis for future inventory and more intensive reconnaissance.

1) The initial reconnaissance was intended to be a general sensitivity plan of archeological site location (i.e. areas of high site density).
2) Field inspection of roadways and other cleared areas amounted to approximately 450 miles of linear coverage within the 300 square miles of the plant and permitted a varied examination of all general land classes, except for the aquatic.
3) All archeological sites were recorded, mapped, and collected with specific attention to detail and thoroughness. The maps of site

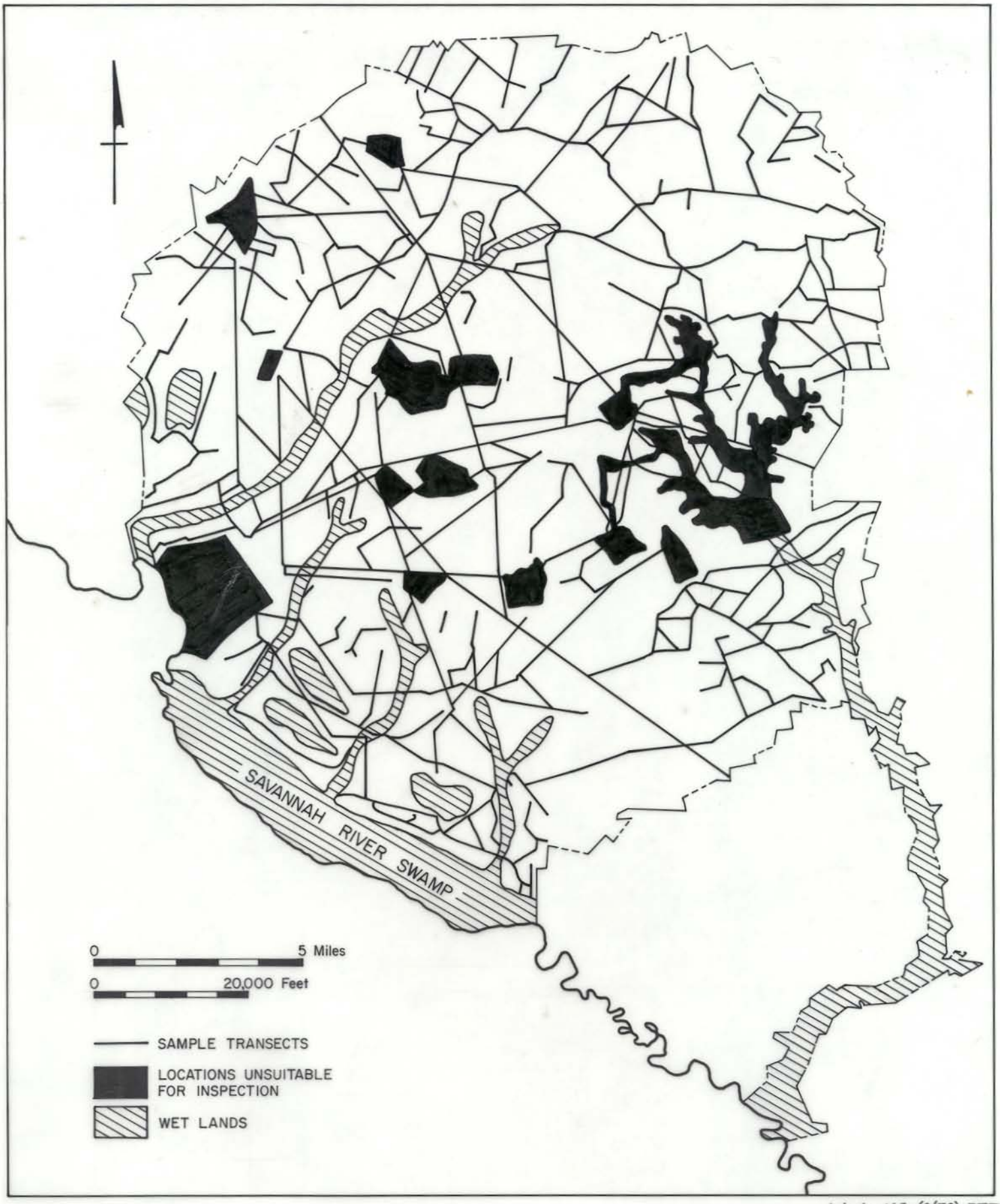

FIGURE 3. Location of reconnaissance sample transects

location and density will provide a general basis for land use planning and archeological analysis.
4) Site collections in most cases were controlled so as to provide data for detailed inspection of functional variability on both intra-site and inter-site bases.
5) Field inspection teams were in all seasons limited to two persons which prohibited intensive test excavations at all but three sites (38AK34, 38AK225 and 38BR176). This fact limits our understanding of site depths and intrasite spatial variability, especially considering the density of vegetation and ground cover away from the roads and trails.
6) The linear form of the sample units limits any understanding of contiguous, block site distribution and related measures of site density. Selected sections of land should be considered as future foci for supplemental reconnaissance.
7) The results of this survey reconnaissance provide a preliminary basis for general predictive models of settlement location, the development of which were beyond the scope of the present study.
8) The lack of testing at archeological sites should be remedied on a selective basis to provide a better sample of information important to dating occupations and determining relative site significance.

Laboratory Methods

Laboratory analysis of the information recovered during the field investigations was oriented toward the examination of two data categories, locational information and artifactual information. Since the intensity of analysis was limited by the bulk of information to be processed and the limits of time imposed by the contract, only general descriptive data were observed with the intent of discerning patterns of locational regularity and artifact variability. The following discussion will explain the procedures by which this information was observed and the criteria by which specific attributes were assigned.

Locational Description

Since a primary goal of this project was the determination of general pattern in settlement or site location for purposes of land use planning, nine specific attributes of site size and location were determined for each site with prehistoric evidence. Historic sites were omitted from this analysis because of the limited sample and the lack of understanding of historic site locational parameters. The nine attributes observed for each site were site size, on-site landform, elevation, aspect, percentage slope, rank of nearest stream, drainage system, and soil type. These attributes were selected for observation because they are among the more objective measures of site location open for observation. Following are the descriptions of each variable.

1) Site size is the estimated two-dimensional extent of the site measured in meters.
2) Landform-Topographic Position is the actual location of the site in terms of general landform types (i.e. Floodplain, Terrace, Hillslope, Ridgeslope, Swamp, Swamp edge, Swamp pocket, Point or Ridgepoint, Ridgenose, and Bluff). This attribute provides some information regarding the relationship of the site to the surrounding topography and vegetation.
3) Elevation was measured in feet above sea level and was used to determine whether sites tended to be situated within specific elevational limits.
4) Aspect is the direction or facing of the site's ground surface (i.e. when facing downhill one is facing in the direction of the aspect). The measurement of this variable was aimed at the determination of favorable facings for sites, especially those which may be winter occupations.
5) Slope Percent is the degree to which the on-site ground surface is inclined. It is measured by a percent which is determined by estimating the number of feet of elevation gained or lost in 100 feet of horizontal distance. This measure was intended to determine if there were any limits or favorable slopes for site location.
6) Rank of Nearest Stream is a measure of the relative size of the stream closest to the site. Stream ranks range from a minimum of 1 (small stream without tributaries) to a maximum of 10 for very large streams (e.g. the Savannah River). The ranking procedure follows that specified by Weide and Weide (1973). In essence the larger the stream rank, the more water flows through the channel.
7) Drainage System is simply the drainage basin in which the site occurs.
8) Distance to Water was measured in meters to the nearest flowing stream. This was measured to inspect any variability in proximity to permanent water which may be related to site function.
9) Soil Type at the site was determined to see whether site selection was based on factors of soil drainage and soil productivity.

Each of these attributes was observed where possible using field and map information. The summary of the locational descriptions is included as Appendix A of this report. Some preliminary analyses are discussed in the research results section of the report.

Artifact Description

Collections gathered from each archeological site were sorted according to specific types indicative of technological, functional and stylistic variation known from previous research to have importance in understanding archeological assemblages from sites in South Carolina. The definitions for the artifact classes summarized in Appendix B are drawn from the work of House and Ballenger (1976:89-94) for the lithic or stone artifacts; while the definitions for the categories used in Appendix C for diagnostic artifacts are drawn from Coe (1964) for the points and various sources

(Caldwell and Waring 1939; Stoltman 1974) for the ceramic surface decorations.

Artifact sorting consisted of segregating collections into four basic groups: debitage (lithic manufacturing debris), tools (shaped lithic objects which indicate use), ceramics (prehistoric baked clay ceramic fragments), and historic remains (any material known to be of non-aboriginal manufacture). Subdivisions within the groups were based on more specific characteristics discussed in the aforementioned references.

The following definitions for terms used in Appendix B are provided as a basic aid in understanding the types of material present at each site.

Primary flakes are lithic pieces removed from a core or larger object during an initial stage of manufacture. The presence of cortex over most of the dorsal surface is the main discriminating attribute in defining such a flake.

Secondary flakes are those removed from a core or biface during secondary working and always have some cortex on the doral surface. These flakes and primary flakes suggest the presence of primary lithic reduction at a site.

Flakes of bifacial retouch are usually small flakes removed in the shaping and thinning stages of tool manufacture; they may also be the result of sharpening dulled tools. These flakes and the other two flake types are the most typical evidence of prehistoric occupation, as manufacturing was a common behavior producing large quantities of debris or debitage.

Tool categories are divided on the basis of the size and form of objects relative to known functional categories. Bifaces are stone cobbles which have been flaked on both surfaces to produce a sinuous edge suitable for cutting. This category is restricted to large bifacially worked tools which were either handle-held knives or preforms for smaller projectile point-knives.

Projectile point/knife is a category of bifacially worked tools that have been formed to fit into a haft of some kind. Since the size of these tools varies greatly the designation projectile point/knife is used to avoid a specific functional assignation for either cutting or piercing. Results of many experiments suggest that these tools were usually used as cutting tools although the smaller triangular forms may have been arrow points.

A uniface is a tool which has been worked or retouched on a single surface producing an edge similar to a chisel or adze. The function of these tools is usually inferred to be related to scraping and general woodworking.

Cores are lithic tools which were used as the source of flakes for the manufacture of other tools. Basically, a core serves as a raw material source for production of flake tools and little else.

Cobble tools are usually river cobbles that have been formed or used as percussing or grinding tools. The presence of such objects suggests manufacturing of tools or processing of plant materials.

In addition to describing the basic assemblage from each site, the materials were sorted by stylistic groups of ceramic surface decoration and projectile point types for purposes of assigning chronological associations at sites. These results are presented in Appendix C and are discussed in the research results section.

ARCHEOLOGICAL INVENTORY

As mentioned in the research goals section of the report, the research conducted during the period from 1973 through 1977 was oriented toward providing the Savannah River Plant, Department of Energy with an initial inventory of archeological sites. In partial fulfillment of this research aim the reconnaissance recorded 309 discrete archeological locations within the plant. In order to familiarize the reader with the nature of each site, descriptions of each are provided.

These descriptions are general in scope with supplemental information for sites provided in Appendices A, B and C. Each site is described with respect to its approximate location within the Savannah River Plant and general artifactual inventory in the following section. No specific references to site location are provided in order to preserve their content from interested collectors of prehistoric remains. The Department of Energy and other parties with scholarly interest in the actual site locations will be provided exact geographic contexts.

Sites in Aiken County

38AK34. This site is composed of prehistoric ceramics and lithics and historic remains scattered along the floodplain at the confluence of Upper Three Runs and Tinker Creeks. Surface examination of the site indicates that the site occupies an area of 750 meters by 750 meters restricted to the floodplain area between the two streams. The artifacts recovered at this site ranged throughout the entire Woodland period. Historic material recovered from the site consists principally of wine bottle glass with no evidence of other historic activity.

During the second phase of the survey four one meter by one meter test pits were excavated to determine the depth and density of the cultural deposits. During this excavation the depth of the deposit was determined to be approximately 70 centimeters and the density was determined as moderate with remains found throughout each 10 centimeter level. Results from the testing further substantiate the conclusion that the site represents a Woodland occupation of some duration.

38AK35. This site, located on a hill slope overlooking Upper Three Runs Creek, is a scatter of prehistoric ceramics and lithics and historic ceramics. Surficial archeological evidence extends for about 100 meters along the ridge and 100 meters toward the stream. Artifactual data consist of chert flakes, a projectile point fragment, sand tempered ceramics, and historic ceramics (pearlware and milk glass). These artifacts suggest an occupation during the Woodland period, possibly the Early Woodland because of the presence of

a sherd of linear check stamped pottery, and a later Historic period occupation during the late nineteenth-early twentieth centuries.

38AK36. 38AK36 is a small scatter of lithic and ceramic remains at the headwaters of a small unnamed tributary of Upper Three Runs Creek. Due to the density of the surrounding vegetation an exact determination of site size was impossible. The low frequency of artifacts recovered at this site may be the result of limited prehistoric activity in that only two chert flakes and one sherd were found. Based on the presence of the sand tempered sherd, this site is tentatively assigned to a Woodland period occupation.

38AK55. This site is located along Upper Three Runs Creek north of S.R.P. road 2-1. It is composed of a scatter of lithics and ceramics spread over three to four acres along the floodplain of the stream. Artifacts consist of flakes of bifacial retouch, cordmarked ceramics, and simple stamped ceramics. This evidence indicates a Woodland period occupation. No collections were available for analysis.

38AK57. This is a small scatter of lithics and ceramics overlooking Boggy Gut Creek, a tributary of Upper Three Runs Creek. The area of the surface collection was heavily eroded by road grading and removal of soil for construction activities. Although the collection from this site consists of only a few flakes and a single prehistoric sherd it is believed that the site once extended over several acres of the terrace. Some of the site appears to be undisturbed on either side of the road indicating that these areas may have potential for further investigation.

38AK60. 38AK60 is characterized by a scatter of lithic and ceramic prehistoric artifacts and was located in a recently logged area along a ridge immediately west of and overlooking Upper Three Runs Creek. The surface scatter extends for over an acre and is located immediately east of road F-1 and southwest of road 8-1. The artifacts recovered include chert flakes and tools and cord-marked pottery, suggesting a Woodland and possibly Archaic occupation.

38AK61. 38AK61 is characterized by a light scatter of prehistoric lithic and historic ceramic artifacts located in a roadcut approximately half way between the intersection of roads F-1 and 8-1 and bridge 8-1 across Upper Three Runs Creek. The surface scatter extends less than a hundred feet along the road surface. The artifacts recovered include a chert flake and a sherd of pearlware. This would suggest botha prehistoric and late eighteenth century-early nineteenth century historic occupation for the immediate area. This historic debris might accrue from an early twentieth century (pre-SRP) house site indicated in the immediate area by the Army Map Corps 1946 Talatha Quadrangle topographic map.

38AK62. 38AK62 is characterized by a light scatter of historic artifacts located in and near the roadcut at the intersection of roads F-1 and 8-1. The site area is on a ridge on the west bank of Upper Three Runs Creek. Inspection of the artifacts recovered suggests a late nineteenth century-early twentieth century occupation corresponding to the period of settlement immediately prior to the establishment of the SRP. The 1946 Army Map Corp Talatha Quadrangle shows several house sites in the immediate area; these may be the source of the recovered artifacts.

38AK63. This site is characterized by a scatter of both prehistoric and historic materials in the roadcut of F-1 and in the vicinity of an adjacent borrow pit to the west. The site area extends along the road for about 400 feet and up to 100 feet west of the road, and is located on a ridgeline elevated 50 feet above and west of Upper Three Runs Creek. The foundations of a small structure and a covered cistern were found in the immediate area of the borrow pit. The artifacts recovered include quartz, chert, and slate flakes and tools; prehistoric plain and cord-marked ceramics; and a wide range of historic glass, metal, brick, and ceramics. Inspection of the artifacts indicates Archaic and Woodland period prehistoric occupation coupled with a historic occupation of probable twentieth century age. The vicinity of the site corresponds to the location of the Treadway Church on old topographic maps; the historic material recovered may represent this structure.

38AK64. 38AK64 is characterized by a scatter of prehistoric lithic and ceramic materials and is located about 100 feet east of road F-1 on the west side of Upper Three Runs Creek. The artifacts were recovered from a small surface area, under 10 feet in diameter, and appear to represent a Woodland period occupation. The sample size recovered was too small to permit a fine temporal classification within the Woodland period.

38AK65. 38AK65 is characterized by a scatter of prehistoric chert flakes and is located immediately east across road F-1 from 38AK63. The site area is small, under 10 feet in diameter, and is located about 20 feet east of the road along a recently logged ridgeline overlooking Upper Three Runs Creek, which is several hundred feet to the east. The site may be a part of 38AK63. Determination of the site's age could not be made from the recovered artifacts. If it is indeed part of 38AK63 the period of occupation may be any time during the Archaic or Woodland eras.

38AK66. This site was characterized by a scatter of both historic and prehistoric material on a timbered terrace overlooking the west bank of Upper Three Runs Creek. The artifacts recovered included chert flakes and historic ironstone ceramics. The nature of the artifacts suggests a prehistoric occupation of indeterminate age and a nineteenth century or twentieth century historic occupation. The existence of several twentieth century house sites for the area, immediately west of the site, is documented on old, pre-SRP topographic maps, and the artifacts recovered may obtain from one of them.

38AK67. 38AK67 represents a scatter of historic and prehistoric artifacts on a logged terrace immediately west and some twenty feet in elevation above Upper Three Runs Creek. An extensive collection of iron, glass, and other historic artifacts was made from the site. A house and two outbuilding are still standing and a large millstone near a dammed stream was noted. The house site almost certainly reflects a pre-SRP occupation that was not leveled and cleared over following the closing of the area. The nature of the prehistoric artifacts recovered, chert flakes and sand-tempered, plain ceramics suggests a Woodland occupation, although the chert flakes could date to any period.

38AK68. This site is characterized by a scatter of historic and prehistoric artifacts in and along the cut of road F-1. The site extends roughly 50 feet north-south by 20 feet east-west and is located on ridgeline parallel to and west of Upper Three Runs Creek at an elevation of about 50 feet above the water surface of the main channel. The nature of the prehistoric artifacts recovered, chert thinning flakes, precludes precise temporal placement of the site in established chronologies for the area, and indicates only a prehistoric occupation. The historic artifacts recovered include nineteenth and twentieth century ceramics and suggest that an occupation of this period is in the vicinity. The Army Map Corps 1946 Talatha Quadrangle indicates a house site near the area of 38AK68; this historic house might be the source of the recovered material.

38AK69. 38AK69 is characterized by a scatter of prehistoric lithic and ceramic artifacts and is located east of road F-1, northwest of the intersection of F-1 and 2-1. The site is located on a high terrace of Upper Three Runs Creek, which is over a half a mile to the east. A small seasonal tributary of Upper Three Runs is located immediately south of the site area. Sand tempered, plain ceramics and a fragment of a small triangular projectile point indicate that a Woodland component is present.

38AK70. 38AK70 is characterized by a scatter of prehistoric lithic artifacts and historic ceramic and glass fragments in and on both sides of road 8-1. The site area extends for a minimum of 250 feet along the road and up to 25 feet to either side. Inspection of the artifacts recovered suggests a long historic occupation in the immediate area, but an extended reconnaissance failed to locate specific sources for the artifacts. The Army Map Corps 1946 Talatha quadrangle depicts two house sites in the immediate vicinity; these twentieth century occupations may be the source of the historic artifact scatter. The prehistoric artifacts were chert flakes and were not diagnostic temporal indicators of other than some form of prehistoric occupation.

38AK71. This site is characterized by a scatter of historic artifacts and is located 80 feet from the east shoulder of SRP 2, south of the Aiken barricade. The artifacts recovered, ceramics and glass, are of almost certain twentieth century vintage, and may represent debris from one or more of the house sites indicated in the area prior to the establishment of the SRP on the 1946 Army Map Corps Talatha Quadrangle.

38AK72. This site is characterized by a scatter of historic materials in the roadcut of Green road (F-1) south of the junction of F-1 and 2-1. The site area is rather small (20 feet x 20 feet) and is located on a ridgeline a mile west of the main channel of Upper Three Runs Creek. Inspection of the artifacts recovered, historic ceramics, suggests a twentieth century occupation within the immediate area. The 1946 Army Map Corps Talatha Quad indicates a house in the area that these artifacts were recovered, and this site probably reflects this structure.

38AK73. 38AK73 is characterized by a scatter of historic artifacts for about 100 feet in and along Greene Road (F-1) at the intersection of that road and a recent logging road coming in to the east. The site area is located a mile west of Upper Three Runs Creek on a low ridge slightly elevated above

the immediately surrounding terrain. Inspection of the historic artifacts recovered suggests a twentieth century occupation; a house site is indicated for the immediate area on the Army Map Corps 1946 Talatha quadrangle and may be the source of the artifacts.

38AK74. This site is characterized by a scatter of historic artifacts in the roadcut of Greene Road (F-1) south of the junction of that road and road 2-1. The site extends for about 100 feet along the road and is on a low rise elevated about five feet above the immediately surrounding area. The artifacts recovered suggest a twentieth century occupation. Prior to the establishment of the SRP there was a house in the immediate area, as indicated on the Army Map Corps 1946 Talatha Quadrangle, and this house site is the probable source of the artifacts recovered.

38AK75. 38AK75 is characterized by a scatter of prehistoric ceramic and lithic artifacts in and along a roadcut on a low ridge about half a mile west of Upper Three Runs Creek. The artifact scatter extends along road F-211 about 60 feet and lies on the west edge of a ridgeline overlooking a low swampy area. The artifacts recovered include unmodified chert flakes and plain sand tempered ceramics and indicate a Woodland and possibly Archaic occupation for the vicinity. One of the prehistoric sherds exhibits linear check stamping on its exterior surface, suggesting a Deptford or early Woodland period component.

38AK76. This site is characterized by a scatter of lithic artifacts along the eastern edge of a ridge overlooking Upper Three Runs Creek. The site area is along and adjacent to road F-211 southeast of the intersection of the road and road F-1. The area of artifact scatter was restricted to a small stretch of road for about 100 feet. The collection of chert artifacts recovered included a bipolar core, an item of lithic technology usually restricted in use to Paleo-Indian and very early Archaic cultures (Goodyear 1974). The extensive patination on this and the chert flakes suggests an early date for the deposition of this material, although age determination based on patination is admittedly risky (i.e. Semenov 1964).

38AK77. 38AK77 represents a scatter of prehistoric ceramics located on a low ridge immediately overlooking the swampy western side of Upper Three Runs Creek. The observed site area is quite small (under 20 feet in diameter) and is located half a mile east of road F-1. Inspection of the artifacts recovered indicates a Woodland occupation; prehistoric ceramics present included plain and cord-marked material of the Cape Fear ware-group. The site area appears to have been disturbed by logging operations.

38AK78. 38AK78 is characterized by a scatter of prehistoric ceramic and lithic artifacts located in a roadcut and open field immediately to the west and along the edge of Upper Three Runs Creek. The site area is a low field elevated 5-10 feet above the swamp and located about a mile and three-quarters above the junction of Tinker and Upper Three Runs Creeks. Inspection of the artifacts recovered, sand-tempered plain pottery and chert thinning flakes, suggests a Woodland period occupation. The artifacts were recovered within an area about an acre in size. An extensive search of the surrounding area failed to disclose additional materials although the ground was largely exposed and artifact visibility excellent.

38AK79. 38AK79 is characterized by a scatter of prehistoric and historic artifacts covering about an acre. It is located in and beside a logging road 200 feet east of a swampy intermittent tributary of Upper Three Runs Creek. The surface of the site is a fine whitish sand partially grown up in weeds, underbrush, and young pine saplings. The ground has recently been torn up by logging operations, probably prior to the planting of the saplings. The prehistoric artifacts present include chert flakes and plain sand tempered ceramics, suggesting a Woodland occupation; while the historic artifacts suggest a twentieth century occupation in the area. Inspection of early pre-SRP era topographic maps revealed several historic house sites in the immediate area; these are the probable sources of the materials recovered.

38AK85. This site is characterized by a scatter of prehistoric lithic and ceramic artifacts along a small ridge overlooking the swamp of a tributary of Upper Three Runs Creek. The swamp of this tributary lies due south of the site, while the extensive swampy channel of Upper Three Runs itself begins a few hundred feet to the east. The site area covers about one acre and is located east of Greene Road (F-1) and north of road F-2111 on soil that has been considerably disturbed by logging operations. Artifacts recovered from the surface of the site included plain or non-diagnostic sand tempered ceramics, chert flakes and tools, and a large quartz cobble that was possibly used as a hammerstone. One chert artifact, a beveled Palmer projectile point is a clear indicator of an Early Archaic occupation while the remaining chert flakes suggest merely a prehistoric occupation. The presence of ceramics indicates a Woodland occupation, although the materials recovered were not diagnostic temporal indicators capable of generating a finer placement within one of the established chronologies for the area.

38AK86. 38AK86 is a scatter of prehistoric lithic material on the crest of a ridgeline overlooking a marshy tributary of Upper Three Runs Creek. The site area lies along transmission line corridor F-2.111, west of Upper Three Runs Creek. Chert flakes and pieces of cracked quartz, possibly fire-cracked rock fragments, were recovered. This material indicates a prehistoric occupation although no specific temporal placement can be made given the data at hand.

38AK87. This site is characterized by a scatter of historic and prehistoric artifacts along a ridgeline to the northeast of a marshy tributary of Upper Three Runs Creek. The site area, on the western side of Upper Three Runs, lies in and along the roadcut for road F-4 east of its intersection with F. All the material was recovered together, within a few square feet, and consisted of historic and prehistoric ceramics. Inspection of this material suggests a Missippian prehistoric occupation (sand-tempered complicated stamped ware) coupled with a nineteenth through twentieth century historic occupation. A house site is indicated in this immediate area on the Army Map Corps 1946 Talatha quadrangle; this house is the probable source of the historic artifacts recovered.

38AK88. 38AK88 is characterized by a scatter of prehistoric artifacts on the top of a high bluff overlooking the one-half mile wide swamp of Upper Three Runs Creek. The creek swamp is immediately east of the bluff and some 30-40 feet below it. The site is located to the northeast of road F, south of the junction of F and F-2. Construction of Road F apparently cut through this site as material continues atop the bluff across the road; this adjacent

area was designated 38AK89. Artifacts recovered from the surface of the site and in eroding gullies dissecting it included cracked quartz cobbles, quartz hammerstones, chert and quartzite flakes and tools, and ceramics. The material appears to represent a Woodland occupation. The site area had been collected previously by unknown parties, probably plant personnel. This was quickly determined by the occurrence of two "reject" piles of flakes and sherds found on the surface.

38AK89. 38AK89 is characterized by a scatter of prehistoric lithic and ceramic artifacts on a bluff and borrow-pit along the southwest side of road F immediately west of Upper Three Runs Creek. The bluff on which the site is located is elevated 15-30 feet above the swamp floor. Road F has bisected the site; material continues across the road at site area 38AK88. Artifacts recovered from the surface included quartz hammerstone fragments, sand-tempered pottery, chert flakes, ane one weathered slate Dalton projectile point. Inspection of these artifacts suggests an Early Archaic occupation (as suggested by the extensive chert flake scatter) and a certain Woodland occupation (as indicated by the ceramics). Comparison of the recovered collections suggests that the main occupation area was in the vicinity of 38AK88, as far more material was recovered there, but such a conclusion must await better sampling procedures than those applied here.

38AK90. This site is characterized by a scatter of prehistoric lithic materials located in and along the roadcut of F-4 and along a road leading off F-4 to a borrow pit. The site area extends approximately 200 feet north-south x 40 feet east-west and is located on a ridgeline overlooking the wide swampy main channel of Upper Three Runs Creek which is located immediately to the east. The site area is located south of the junction of F-4 and F. Artifacts recovered from the surface included chert flakes and tools and one large quartz flake. The chert artifacts included two serrated, triangular biface fragments and one laterally retouched flake.

38AK91. 38AK91 consists of a scatter of prehistoric lithic materials along a ridgeline overlooking Upper Three Runs Creek. The site area extends approximately 175 feet east-west by 75 feet north-south in and to the north of the cut for road F-4. The ridgeline is elevated some ten feet above the swamp floor, which extends to the creek, about a third of a mile to the south. Chert and quartzite flakes, a quartz hammerstone (possibly also used as a grinding stone), and five unifacial chert tools including two end scrapers and one side scraper were recovered. The heavy patination on the chert coupled with the lack of ceramics and the excellent workmanship of the scraper all strongly suggest an Archaic occupation for the site.

38AK92. This site is characterized by a scatter of both historic and prehistoric artifacts in a roadcut and adjacent borrow pits to the west of Tim's Branch of Upper Three Runs Creek. The site is located north of road C and the railroad tracks (M-line) on a ridgeline elevated 10-20 feet above the swampy channel of Tim's Branch, which is immediately to the north and east of the site area. Materials were observed over an area of about half an acre and included very heavily patinated chert flakes and one side scraper as well as a number of historic ceramic fragments. A great deal of modern debris was observed in the site, and most of the recovered ceramics appear recent, but two sherds of transfer printed pearlware were also recovered and

suggest a possible nineteenth century occupation. The chert artifacts appear quite old because of their patination, but little other than the existence of some form of prehistoric occupation for the immediate area can be inferred from them.

38AK93. This site represents a scatter of prehistoric ceramic and lithic artifacts over several acres of ground along the slope of a ridgeline above Tim's Branch swamp. The swamp floor is approximately 30-40 feet below the area where the artifacts were observed. The site runs along the edge of this swamp for several hundred feet. The area has recently been cleared and pine saplings have been planted. Artifacts recovered from the surface of the site include ceramics, chert flakes and tools, and a large quartz cobble grinding/hammer stone, indicating a Woodland and possibly Archaic period occupation in the area. One of the chert flakes recovered is a bipolar core fragment. This artifact and the hammerstone suggest a possible Archaic occupation in the area.

38AK94. 38AK94 is characterized by a scatter of prehistoric and historic artifacts over about two acres along a ridgeline above the western margin of Tim's Branch Creek. The site area has recently been clear cut and scraped and is partially covered with weeds and pine saplings. The artifacts were recovered on level to gently sloping terrain some 70 feet in elevation above the swamp floor. Chert flakes and tools, sand tempered prehistoric ceramics, historic pearlware and earthenware ceramics, and glass were recovered from the surface. Inspection of the recovered material indicates a late Archaic-Woodland occupation coupled with a probable nineteenth and twentieth century historic occupation. A cluster of three houses is indicated in the immediate vicinity of this site on the U. S. Army Map Corps 1946 Talatha Quadrangle and probably represents the source of the historic material.

38AK95. This site is characterized by a scatter of historic and prehistoric artifacts on a low ridge immediately east of and 5 feet above Tim's Branch swamp. The site area observed was contained within a forty foot circle. Immediately to the east is a steep ridgeline rising to 50 feet above the swamp. This ridgeline has massive, boulder size outcroppings of conglomerate on its slopes and top. A brief inspection of it did not reveal any cultural material. Simple stamped and plain sand tempered ceramics and unmodified chert flakes were recovered, indicating a Woodland occupation. One piece of alkaline glazed stoneware recovered suggests a modern occupation; a house site in the immediate area is indicated on the Army Map Corps 1946 Talatha Quadrangle.

38AK96. 38AK96 is characterized by a scatter of historic ceramics on a low neck of land extending out into the swamp on the western side of Tim's Branch. This neck of land extends about 200 feet into the swamp and runs from a series of high bluffs running along the swamp edge to the west. The site area is quite small (under 20 feet diameter) and is located east of road 2, south of where the road crosses Tim's Branch. Historic shell edged pearlware ceramics were recovered on bare ground where logging trucks and heavy equipment tore up the ground surface. 38AK93, 38AK94, and 38AK97 are all in the immediate vicinity of this site on the western side of Tim's Branch. Inspection of the historic artifacts suggests a nineteenth century occupation; several house sites are indicated in this area on the Army Map Corps 1946 Talatha Quadrangle and may be the source of this material.

38AK97. This site is characterized by a scatter of historic artifacts on a low bluff overlooking the swampy western edge of Tim's Branch. The swamp floor is about 200 feet east and 30 feet in elevation below the area of the artifact scatter. The site area covers about one quarter of an acre and is located east of road 2 and about a thousand feet south of where Tim's Branch crosses this road. The artifacts recovered include several varieties of pearlware ceramics and suggest a late eighteenth century-nineteenth century occupation in the area. Several houses were indicated in the area on old topographic maps, and one or more of these house sites may be the source of the materials recovered.

38AK98. 38AK98 is characterized by a scatter of both historic and prehistoric artifacts located on a ridgeline immediately east of and overlooking Tim's Branch of Upper Three Runs Creek. The site area covers about one acre and is located west of the junction of F-3 and Deer Kill Road. The site is on a relatively flat bluff that drops steeply to the swamp floor, some twenty feet below on its western edge. Chert flakes were recovered and indicate a prehistoric occupation. The historic artifacts recovered include glass and white earthenware and are almost certainly of the twentieth century age. A house site indicated in the immediate area on the Army Map Corps 1946 Talatha Quadrangle, probably represents the source of the historic artifacts.

38AK99. 38AK99 is characterized by a scatter of prehistoric chert flakes and tools in and along the roadcut of F-3 on a ridgeline along the eastern edge of a swampy tributary of Upper Three Runs Creek. Artifacts were recovered along and adjacent to the roadcut for about 200 feet. Over this distance the ridgeline rises from about ten to twenty feet in elevation above the swamp. The site area is located on F-3 about half-way between the junctions of that road with 2-3 and F-1. The chert artifacts recovered included two biface fragments and a large unifacial core scraper. A prehistoric occupation is indicated.

38AK100. This site is characterized by a scatter of chert flakes and tools along a low ridgeline elevated some 10-30 feet above and to the west of a swampy tributary of Upper Three Runs Creek. The site covers about half an acre and artifacts were found in and up to 50 feet away from the roadcut of F-3. The site is located east of Tim's Branch and north of Upper Three Runs Creek. Inspection of the chert flakes and tools indicate a possible Archaic occupation for the area, based on the presence of a large biface fragment and the heavy patination exhibited on most of the specimens.

38AK101. This site consists of a scatter of chert flakes on the top and slopes of a low bluff west of a swampy tributary of Upper Three Runs Creek. The site area covers about a quarter of an acre and lies along road 2-3, south of the junction of that road and F-3, and 1 1/4 miles north of Upper Three Runs Creek. Artifacts were recovered in the roadcut and on exposed soil north of the road where logging and borrow-pit operations had disturbed the ground. The chert flakes recovered indicate a prehistoric occupation of indeterminate age.

38AK102. 38AK102 consists of a scatter of prehistoric ceramic and lithic artifacts located on a ridgeline immediately east of a swampy tributary of Upper Three Runs Creek. Artifacts were recovered along and adjacent to a 300 foot section of road F-2 east of the tributary. Over this distance the elevation above the stream channel rose from about 25 to 40 feet. Site 38AK101 is located immediately to the west across the creek on the opposite ridgeline. The site covers about one acre and is located one mile southwest of the junction of F-2 and F-3, and north of Upper Three Runs Creek. Artifacts recovered from the surface of this site included plain sand tempered prehistoric ceramics and unmodified chert flakes. These artifacts indicate a Woodland and possible Archaic occupation.

38AK103. 38AK103 is characterized by a scatter of prehistoric chert flakes and tools and ceramics along a ridgeline overlooking a small swampy tributary of Upper Three Runs Creek. Artifacts were recovered for about a 75 foot stretch along and adjacent to road F-3 on the west side of the swamp along the slopes of the ridgeline at elevations of from ten to twenty feet above the marsh. The site area is located west of the junction of F-3 and F and north of Upper Three Runs Creek. Inspection of the ceramics indicates a Woodland period occupation, while the lithic scatter could be either of that period or of the preceeding, preceramic periods. No diagnostic lithic temporal indicators were recovered to permit a more precise placement.

38AK104. This site is a scatter of prehistoric chert flakes along the slope of a ridgeline overlooking a small swampy tributary of Upper Three Runs Creek. The artifact scatter was observed along and adjacent to road F-3 on the eastern edge of the swamp and at elevation from 20 to 40 feet above it. The site is located north of Upper Three Runs Creek and west of the junction of F-3 and F. The nature of the recovered artifacts, chert flakes and unifacial flake tools, is such that an exact temporal placement is impossible. The lack of ceramics and the heavy patination evident on the chert would suggest an early, possible Archaic occupation.

38AK105. 38AK105 is characterized by a scatter of historic and prehistoric artifacts along a low bluff overlooking a swampy area, Turner Branch, that is drained by Upper Three Runs Creek. The site encompasses about three acres and extends for about 600 feet along the west side of the swamp, which lies about 100 feet distant and 20 feet lower. The site lies midway between roads 2-3 and F-3, north of road F-3 and north of Upper Three Runs. The site has been clear-cut and graded recently, disturbing the soil and exposing artifacts. Chert, quartz, and slate flakes and tools were recovered, as were both prehistoric and historic ceramics. The historic ceramics appear to be of recent origin and a house site indicated in the immediate area on the Army Map Corps 1946 Talatha Quadrangle is the probable source. The prehistoric ceramics, all apparently Deptford ware, indicate a Woodland occupation while the chert points, flakes, and tools recovered suggest both Woodland and an Archaic occupations.

38AK106. This site is characterized by a scatter of prehistoric lithic and ceramic artifacts along a high bluff immediately south of and overlooking Upper Three Runs Creek. The site extends over several acres along the top of a ridgeline, about 800-1000 feet south of Upper Three Runs. The site overlooks a small tributary of the main channel; this tributary lies 40-50

feet in elevation below and immediately south of the ridgeline. Artifacts were recovered in and near road C-4 and for several hundred feet along a road leading off the east. Artifacts recovered on the surface of this site include quartz, chert, slate, and quartzite flakes; two chert biface fragments; and three undecorated sand tempered sherds. The ceramics and the biface fragments, which resemble crude triangular points, indicate a Woodland occupation, although some or all of the unmodified flakes recovered could belong to the preceeding pre-ceramic Archaic period.

38AK107. This site is characterized by a scatter of historic and prehistoric artifacts recovered in and near the roadcut for D-1-5 midway between the intersection of that road and roads 2 and F. The site area extends along the road for about 300 feet and is located on gently rolling uplands well away from Upper Three Runs or any of its tributaries. About a half mile to the southeast a swampy area, the upper reaches of Turner Branch, begins and is the nearest such water source. Artifacts recovered include modern ceramics, suggesting a twentieth century occupation, and several heavily patinated chert flakes and unifacial tools, indicating a prehistoric, probable Archaic occupation for the area. The historic material almost certainly originated at one of the several house sites shown in the area on the Army Map Corps 1946 Talatha Quadrangle.

38AK108. A single biface fragment was recovered from this site. It lay along the edge of a large borrow pit located to the west of the SREL and Forestry headquarters area. The borrow pit removed an area about 200 feet on a side to a depth of 35 feet. The biface fragment, indicating a prehistoric, possible Archaic occupation, was recovered near one of the drops to the east of the pit. Several pieces of extremely weathered chert-like rocks were recovered from within the pit; these appear to be natural and not man-made.

38AK109. This site consisted of a scatter of prehistoric and historic ceramics over about an acre of land on the slope of a ridgeline overlooking a small valley. The site area was elevated some 40 to 50 feet above the valley floor, which is 300 feet wide in this area. The area was recently logged and planted in pine saplings and is located west of the junction of roads 2 and F. Artifacts recovered included cord-marked pottery from the prehistoric Woodland period as well as modern ceramics, probably from one of the structures indicated in the area on pre-SRP topographic maps such as the Army Map Corps 1946 Talatha Quadrangle.

38AK110. This site is characterized by a scatter of historic and prehistoric artifacts over an area of about 3/4 of an acre in the immediate vicinity of the junction of roads A-3 and C-1. The site area is located about 1000 feet north of Upper Three Runs Creek and artifacts were recovered on exposed surface areas along road cuts, eroding gullies and on cleared ground along the powerline. Artifacts recovered included historic glass and ceramics, chert and quartz flakes, linear check stamped pottery (Deptford ware-group), and quartz cobbles. Inspection of the material recovered suggests a nineteenth-twentieth century historic occupation and Woodland and possible Archaic prehistoric occupation. No house sites in the immediate area were noted on the Army Map Corps Quadrangles, arguing for a possible nineteenth century occupation within the area.

38AK111. 38AK111 is characterized by a scatter of chert flakes on exposed ground surfaces on the slopes of a ridgeline north of and overlooking Upper Three Runs Creek. The site extends over about half an acre and is located 200 feet south of road A-3, between that road and its junctions with roads A and C-1. The creek swamp is located some 200 feet south of the site, and the soil has been disturbed by logging activities. The artifacts recovered, chert thinning flakes, indicate a prehistoric occupation.

38AK112. This site is characterized by a scatter of prehistoric lithic and historic ceramic and glass artifacts along a 75 foot stretch of Bates Road (A-3), east of road A. The site area is located on a ridgeline 60-70 feet in elevation above and several hundred feet north of Upper Three Runs Creek. Artifacts recovered include chert thinning flakes and one uniface, indicating a probable prehistoric Archaic occupation, based on the lack of ceramics. Historic ceramics recovered include purple tinted glass popularly referred to as "Depression glass" and white earthenware, indicating a probable twentieth century occupation, although no house sites are indicated in the immediate area on old topographic maps.

38AK113. A single chert biface fragment found in the cleared area around well P9R characterizes this site, which is located west of the upper reaches of Tim's Branch. The soil in the immediate vicinity has been disturbed by ground clearing activities around the well. The biface fragment recovered is the basal section of a large point. The basal sides appear to have been ground, and thinning flakes suggestive of fluting removed. This artifact strongly suggests an Archaic or possible Paleo-Indian component, although the find was the only artifact recovered in a cleared area of almost an acre.

38AK114. 38AK114 is characterized by a scatter of chert flakes and tools and historic ceramics recovered on cleared ground near wellhouse P8R and for 300 feet along a logging road leading off the southeast. The site area extends over several acres to the west and southwest of a large swampy pond some 500 feet away. It is located west of road D on ground surface that has been disturbed by logging, the well construction, and road scraping. The artifacts recovered include chert thinning flakes and most of a chert Savannah River stemmed point, indicating a Late Archaic prehistoric component for the area. The historic ceramics recovered were of ironstone and white earthenware, indicating a modern occupation. Several houses are shown in the general area of this site on the 1946 Talatha Quadrangle, and one or more of these may have been the source of the artifacts recovered.

38AK115. This site, located about 400 feet southwest of 38AK114, is characterized by a scatter of chert flakes and tools and modern ceramics. The site area extends over about a quarter of an acre in and to the east of a logging road on a low bluff overlooking a large swampy pond 300 feet to the north. The site is roughly 250 feet down the first logging road on the right off road C-1-1, west of its intersection with road D. The chert artifacts, in addition to flakes, included a biface fragment. The assemblage indicates a prehistoric, possible Archaic occupation. The historic ceramics were white earthenware of almost certain twentieth century age; these might have come from one of several house sites indicated in this area on the Army Map Corps 1946 Talatha Quadrangle.

38AK116. This site consisted of a single large unmodified chert flake in the roadcut of Cook Road. The road has been scraped and the context of the artifact is therefore doubtful. The site area is on the slope of a rolling hill at the junction of Cook Road and an SCE & G 115 KV power line northeast of Gatehouse 701-6-G. The chert artifact recovered indicates a probable prehistoric component somewhere in this area. No temporal placement within the prehistoric period could be made from this artifact.

38AK117. This site was characterized by a scatter of chert flakes along the southern edge of a large dump pit west of road C-1, and south of the junction of that road with C-1-1. It is on an upland ridge well away from major watercourses, and the area has been heavily disturbed by garbage disposal and forestry activities. The chert flakes recovered indicate a prehistoric occupation within the area, but no exact temporal or spatial placement can be made at this time due to the nature of the artifacts collected and the extensively disturbed ground surface.

38AK118. 38AK118 consists of a scatter of historic and prehistoric artifacts recovered at the intersection of two access roads and a 115 KV power line corridor northwest of the junctions of roads 2 and C. The site extends over about an acre and is located on a ridgeline elevated about 20 to 30 feet above a swampy depression to the west. The area has been disturbed by ground clearing, roadcuts, and subsequent erosion. Artifacts recovered include modern ceramics, probably from one of several house sites that were in this area prior to the establishment of the SRP (1946 Talatha Quadrangle). A large, chert, unifacial tool and an extensively resharpened bifacial knife, popularly called a cruciform "drill" were recovered, suggesting a Late Archaic occupation for the area. The placement of the prehistoric component within the Late Archaic is based on the similar forms at Stalling's Island (Bullen and Green 1970; Claflin 1931).

38AK119. This site is characterized by a scatter of historic and prehistoric artifacts along and adjacent to the roadcut of road A-2, east of the plant boundary and north of Upper Three Runs Creek. The site is located on level ground overlooking and east of the channel of a small tributary of Upper Three Runs Creek. Artifacts were collected on exposed soil surfaces for 400 feet along and away from the cut of road A-2, with the largest concentration of artifacts occurring near the stream. Artifacts recovered included plain, cord marked and complicated stamped pottery; chert flakes; and a wide range of historic ceramics. The historic artifacts are of the nineteenth and twentieth centuries and probably derive from a house site in this area prior to the establishment of the SRP. An old tumbled-down shed is located in the site area. The prehistoric material recovered indicates a late Woodland component with the possibility of earlier Woodland or Archaic components open.

38AK120. This site is characterized by a scatter of historic and prehistoric artifacts recovered in a firebreak and on the surface of a ridgeline elevated some 60-70 feet above the northern bank of Upper Three Runs Creek. The site extends for several hundred feet along this ridgeline and is east of USCGS marker 1961 D103, immediately west of road A and south of road A-2. The artifacts recovered include prehistoric chert flakes, historic stoneware, and white earthenware, and indicate a prehistoric and

modern occupation in the area. The 1944 Ellenton Quadrangle indicates two house sites in this immediate area; these represent the probable sources of the historic debris.

38AK121. 38AK121 is characterized by a scatter of chert flakes and tools in a cleared, but overgrown field located on a ridgeline about 20-30 feet in elevation above Upper Three Runs Creek swamp. The site is small, less than 50 feet in diameter, and is located east of Box Landing Road and south of road A-2. The artifacts recovered include chert flakes, one unifacially retouched flake, and one possible bipolar core fragment. The assemblage indicates a prehistoric, possible Archaic occupation, but exact temporal placement is impossible given the material at hand.

38AK122. 38AK122 consists of a scatter of historic and prehistoric ceramic fragments located north of the junction of Brinkley Road (A-2) and Box Landing Road. The site covered about a quarter of an acre on a ridgeline south of and overlooking a swampy tributary of Upper Three Runs Creek. The area was densely overgrown and the site may be more extensive than reported. The ridgeline slopes gently to the swamp floor a hundred feet distant and 10 to 15 feet lower in elevation to the north. Prehistoric cord marked pottery and historic pearlware and saltglazed stoneware ceramics were recovered from the surface. These artifacts indicate Woodland and nineteenth century occupations in the area.

38AK123. This site was recognized by the recovery of a single chert flake on the surface of a ridgeline immediately north of and some 20-30 feet in elevation above Upper Three Runs Creek swamp. The site lies in a scrub-overgrown field south of road A-2 and about one mile west of road A. The artifact recovered indicates a prehistoric occupation, but specific temporal placement is not possible.

38AK124. 38AK124 consists of a scatter of prehistoric and historic artifacts along a ridge to the north of and overlooking Upper Three Runs Creek. The ridge is 20 to 40 feet above the creek. The site is located on both sides of Road A, where it cuts through the ridgeline. It extends over two acres and is located immediately north of the main swamp of Upper Three Runs Creek. Artifacts recovered included chert flakes, historic ceramics, and thick wine bottle fragments. The artifacts recovered indicate a prehistoric occupation and a lengthy historic occupation, from modern times back to the nineteenth or late eighteenth century. Three house sites are reported in this area on the 1944 USGS Ellenton Quadrangle, and any or all of these may have been the source of the historic artifacts recovered.

38AK125. This site is characterized by a scatter of historic artifacts in the roadcut of A-2 west of road A and north of Upper Three Runs Creek. It lies on a ridge elevated about ten feet above a swampy tributary of Upper Three Runs; this swamp is located immediately west of the site. The artifacts recovered were found in a small cluster along the roadway and include salt glazed stoneware ceramics and green wine bottle glass, suggesting an eighteenth or nineteenth century occupation. No specific house sites or concentrations of material were noted elsewhere in the immediate area during the second season of survey.

38AK126. A historic cemetery and a scatter of historic and prehistoric artifacts characterize this site, which extends over several acres along and near Brown Road (A-1-1), and east of the Seaboard Coast Line RR tracks. The site area is located west of the junction of roads A and A-1. A large swampy depression is located to the north and east of the site area; road construction and timbering activities have disturbed the soil right to the edge of this swamp. The historic cemetery has a small metal sign labeled "Berpy" by it. The cemetery is about 120 x 100 feet and is heavily overgrown in scrub brush and hardwoods. The only grave markers present were two railroad track metal lengths cut and erected vertically, and one cast iron commercial grave marker-card holder. The cemetery is delimited by four red plate tagged metal poles, and shallow depressions indicating probable collapsed graves are located throughout the cemetery. Behind the cemetery large quantities of brick and ceramics were observed; these may have come from a chapel associated with the cemetery. Artifacts recovered over the site included chert flakes and a quartz cobble (possibly an anvil-hammerstone) and historic wine bottle glass, pearlware, and stoneware. These artifacts indicate a prehistoric occupation and a lengthy historic occupation from perhaps as early as the late eighteenth century until modern times.

38AK127. 38AK127 is characterized by a scatter of historic and prehistoric artifacts in and beside the scraped cut of road A-1 for 350 feet along this road to the west of its junction with A. The general site area is north of Upper Three Runs Creek and is generally low-lying and swampy. A small swampy area some 200 feet in diameter lies 200 feet west of the roadcut/artifact scatter. Artifacts recovered from exposed surface areas included unmodified and retouched chert flakes and a variety of historic ceramic fragments. Inspection of these artifacts indicates a prehistoric occupation of indeterminate age or character, and a historic occupation of nineteenth-twentieth century age. The 1946 Talatha Quadrangle indicates several house sites in the immediate area; these are the probable sources of the historic artifacts recovered.

38AK128. A heavily patinated chert end scraper discovered in the roadcut of A-1 west of its junction with A-1-1 characterizes this site. The artifact was recovered on exposed soil on a low rise elevated ten feet above a swamp that surrounds the area. This site lies a few hundred feet west of 38AK127 and contains modern brick and ceramic debris which was not collected because of its recent origin. The chert scraper suggests an Archaic occupation because of the heavy patination and high degree of skill exhibited in its workmanship. Such a conclusion is only tentative, and a more precise temporal placement must await the recovery of additional material.

38AK129. This site is characterized by a scatter of prehistoric lithic and ceramic artifacts along the top and slopes of a ridgeline immediately to the north of and overlooking Upper Three Runs Creek swamp. The site extends over about half an acre and is elevated from 20-40 feet above the swamp floor. Artifacts were recovered in and away from the cut of road C-2-1 due north of the one half mile wide creek swamp. Materials recovered included chert flakes and tools and sand tempered cord marked pottery, indicating a Woodland and possibly an Archaic occupation.

38AK130. 38AK130 is characterized by a scatter of prehistoric lithic and ceramic artifacts along the top and slopes of a ridgeline overlooking and immediately north and west of the swamp of Upper Three Runs Creek. The site area extends over about half an acre and is elevated some 30 feet above the swamp floor. The site 38AK129 is located on an adjoining ridge several hundred feet to the north, with a low, marshy area separating the two ridges. The site is located along and away from road C-2-1. Artifacts recovered include chert flakes, two biface fragments, and sand tempered cord marked pottery. Inspection of this material indicates a Woodland and possibly a late Archaic occupation as well. The Archaic occupation is inferred from the presence of a Savannah River stemmed projectile point base.

38AK131-
38AK135. Sites 38AK131-38AK135 are all located along a half mile stretch of this ridgeline. The site area is located along road A-1 south of a tree with a metal plaque reading "Bearing Tree 582° WO.385 dist." This tree is located within ten feet of corner post #356 along the outer fenceline of the plant. Inspection of the artifacts recovered indicates prehistoric occupations in the area of indeterminate age.

38AK136. 38AK136 was characterized by a single, blocky chunk of chert recovered near the bulldozed and earth covered ruin of a 20th century house. The site is located along Bates Road (C-1). It lies several hundred yards east of an un-named tributary of Upper Three Runs Creek, and is about a mile north of the creek itself. Brick, tile, wood and glass were scattered about, and the highly disturbed nature of the area makes a prehistoric component, based on one artifact, highly suspect.

38AK137. This site was characterized by the presence of one heavily patinated chert flake exhibiting bipolar detachment and extensive step fracturing on opposing sides. The artifact, the only one noted in the area, was recovered in an eroding gully on Bates Road (C-1). The site is on the slope of a ridgeline overlooking the Upper Three Runs Creek floodplain. The creek channel is located about 1/5 mile to the south across a wide, flat, marshy area. The area has been disturbed by grading activity and erosion. No cultural period determinations were possible, although bipolar flaking is common to the Early Archaic and Paleo-Indian periods.

38AK138. This site was characterized by a single chert flake recovered in the cut for an access road to a 115 KV power transmission line corridor. The site is located on a ridgeline about 1/4 mile to the northwest of the Upper Three Runs Creek swamp, and immediately to the west of and overlooking a small tributary of the main creek. No other artifacts were noted, although the surface of the ground was disturbed by the road grading. No occupational period determination could be made based on the available sample.

38AK139. 38AK139 was a scatter of prehistoric and historic artifacts over an area of about three acres on a ridgeline at the junction of an unnamed tributary with the main creek swamp of Upper Three Runs. The ground surface had been heavily disturbed by borrow pit activity and by the recent seeding of conifers. Artifacts included chert, slate, and quartz flakes and tools, and a range of historic ceramics, of which earthenware and stoneware of the 19th and 20th century age predominated. A house is shown several hundred

feet to the northeast of this site on the Army Map Corps 1959 Talatha Quadrangle. One quartz stemmed point and one chert Guilford-like point base were recovered, suggesting an Archaic component. The presence of several sherds of check and linear check stamped ware suggests a Woodland, probable Deptford component.

38AK140. 38AK140 was an extensive scatter of prehistoric and historic artifacts along a ridgeline overlooking and to the north of Upper Three Runs Creek. The site runs along and is west of a small tributary that feeds into the main creek swamp. A number of concentrations or clusterings of artifacts were noted, although the scatter extended over several acres for a thousand feet to the north along the ridgeline. The site lies immediately north of 38AK139, and about 1 1/4 miles to the southeast of the intersection of roads C and 2. Simple stamped, cordmarked, and linear check stamped sherds of the Deptford and Cape Fear Ware groups were recovered, as well as one sherd of Stallings fiber tempered pottery. A large number of chert flakes and tools, and a few quartz and slate flakes were recovered, including a beveled Palmer point. Historic ceramics included stoneware, earthenware, and pearlware of a probable 19th century age. Both Woodland and Archaic components are present, and a 19th century, historic occupation is also indicated. The site area is open and was heavily disturbed by logging operations and conifer planting.

38AK141. This site was located immediately to the north of 38AK140 and was separated from it by a low marshy gully. It is located about one mile southeast of the clover-leaf at the junction of SRP 2 and SRP C, and extended for several hundred feet along a ridgeline overlooking the main creek swamp of Upper Three Runs. The site area was extensively disturbed by recent ground clearing activities; and small pine saplings had been planted, but these were overshadowed by weeds. Artifacts recovered from this site included simple stamped, cordmarked, check stamped, fabric impressed, and plain pottery. In addition, there were several chert flakes and tools, some of which had been thermally altered. Historic artifacts recovered included lead glazed stoneware, delft, pearlware, creamware, wine bottle fragments, and earthenware. Woodland and 19th century components appear to be present, and it seems probable that earlier, Archaic and 18th century occupations are present as well.

38AK142. This site was characterized by an extensive scatter of historic and prehistoric artifacts along a ridgeline north of and overlooking a small swamp that drains into Upper Three Runs Creek. The site is in a large open field recently cleared and planted in small pine saplings. Artifacts recovered included several triangular projectile points of chert and a large number of chert flakes and tools. One chert core fragment was present, and many of the flakes were thermally altered, some apparently accidentally. Simple stamped, cord marked, check stamped, plain, and punctuated ceramics were present. The presence of pearlware, earthenware, and wine bottle fragments suggested a 19th century occupation, while most of the prehistoric material appears to be from the Woodland period.

38AK143. This site was a prehistoric and historic artifact scatter located south of SRP C and near the cloverleaf formed by the junction of C and 2. The site extends for about 600 feet along the edge of and up to 200 feet away from a swampy tributary of Upper Three Runs Creek. It extends along the north and northeastern extremities of the swamp, between 38AK142 to the south, and 38AK144 to the east and southeast. The area has been extensively disturbed by logging operations, including recent clear-cutting, scraping, and sapling planting operations. Most of the material was observed within 200 feet of the swamp. Simple stamped, cord marked, and check stamped pottery; chert and quartz flakes; chert unifaces and crude bifaces; and a smoothed mano with pits in both faces (nutting stone?) were recovered, suggesting a Woodland occupation. Historic artifacts recovered included white earthenware, polychrome and transfer printed pearlware, ironstone, and alkaline glazed stoneware, suggesting a 19th century occupation. The Army Map Corps 1959 Talatha Quadrangle shows a house site in the immediate area; this may be the source of the artifacts.

38AK144. 38AK144 is a prehistoric flake and sherd scatter located south of SRP C and one mile east of the junction of C and 2. The site area covers about two acres and is located on the slope and top of a ridge northeast of a swampy tributary of Upper Three Runs Creek. The site area has recently been cleared and planted in pine saplings; the ground clearing operations extensively disturbed the soil. Chert flakes, some of which were unifacially and bifacially retouched; one large fossiliferous cortical fragment of chert; and plain and linear check stamped ceramics were recovered, indicating a Woodland, probable Deptford occupation with earlier Archaic occupations possible.

38AK145. This site is characterized by several chert flakes and one biface fragment located in exposed sand and clay along the slope of a ridgeline immediately overlooking Upper Three Runs Creek. The site area is immediately south of road C and northwest of where C crosses the creek. The surface of the site had been somewhat disturbed by erosion and logging. Inspection of the recovered artifacts suggests an Archaic occupation, but this is uncertain.

38AK146. This site is a prehistoric flake scatter located in and along the side of road C.4. It is about 50 feet in diameter and is located along the slope of a ridgeline north of and overlooking the Four Mile Creek Swamp. No diagnostic artifacts were discovered, and only a prehistoric component can be inferred given the present data.

38AK147. 38AK147 is characterized by a scatter of prehistoric lithics and ceramics along a ridge to the south of and overlooking the Upper Three Runs Creek swamp. The site is about 75 feet in diameter and is located in the roadcut of a 115 KV power transmission line corridor running perpendicular to road C-3 to the northwest. Artifacts recovered included cord marked pottery of the Cape Fear ware-group, chert flakes, and two triangular projectile point fragments, indicating a Woodland period occupation.

38AK148. This site is a prehistoric flake and sherd scatter located for 50' in the roadcut of a dirt road joining C-3 (Burma Road) and A-6, west of the Four Mile Creek. It is located on a low rise on the ridgeline. Although recent logging operations have cleared the ground surface in much of the immediate area, no other remains were found. One chert flake and two cord marked ceramic sherds of the Cape Fear ware-group were recovered, suggesting a Woodland occupation.

38AK149. 38AK149 is a scatter of prehistoric lithic and ceramic artifacts located in the roadcut of road A-6 and in adjacent borrow pit areas to the south of the road. The site is located on a low ridgeline overlooking and 150 feet west of Four Mile Creek. Chert flakes and cord marked, linear check stamped, and plain ceramics were recovered, indicating a Woodland period occupation. The site area has been disturbed by the roadcut and borrow pit operations.

38AK150. This site is characterized by a scatter of chert flakes and historic ceramics located on the exposed and eroding surface of a ridgeline overlooking Four Mile Creek. It is located on the south side of road C, east of the junction of C and E, between a large borrow pit and the creek. The ridgetop is elevated 40 feet or more above the creek swamp, which is immediately below and to the north of the site. The site is about a quarter of an acre in size. Three heavily weathered chert flakes and two sherds of white earthenware were noted, indicating prehistoric and modern components. Large surface areas were exposed, so the small number of artifacts recovered may indicate infrequent use of the area.

38AK151. 38AK151 is a prehistoric lithic scatter located along a ridgeline south of and overlooking at an elevation of 50' a small tributary of Upper Three Runs Creek. It is immediately north of a trash dumping area and west of area F. Up to within 75 feet of the ridge edge the ground was extensively disturbed by borrow pit and ground clearing activities. A number of chert and quartz flakes were recovered, a few of which exhibited retouch. No diagnostic artifacts were recovered, and only a prehistoric component can be inferred.

38AK152. One sand tempered plain aboriginal ceramic fragment was recovered on the western edge of a steep ridge elevated above Upper Three Runs Creek. The ridge is located about 75' above the creek, a few hundred feet north. The site is located immediately south of the M railroad line and west of road C-4. A Woodland component in the area is inferred, although no additional artifacts were noted.

38AK153. 38AK153 is a prehistoric sherd and flake scatter covering about an acre. It is located from 300 to 500 feet along the dirt road running from C-4 to the pond between area F and the Burial Grounds. Artifacts were recovered in and up to 40 feet away from the roadcut, which runs parallel to and 50' north of a sharp drop-off to a tributary of Upper Three Runs Creek. This tributary flows to the northwest to the main creek channel. The ridgetop is somewhat eroded and disturbed by logging. Sand tempered, simple stamped and cordmarked potsherds were recovered, as well as a number of unmodified chert flakes. A Woodland component is indicated by the materials recovered.

38AK154. This site is a prehistoric sherd and flake scatter located about 800 feet along the dirt road running from road C-4 to the pond between area F and the Burial Grounds. The site extends over about an acre around a low rise on top of a ridgeline overlooking a swampy tributary of Upper Three Runs Creek. It is elevated 50' above the creek. The area has been disturbed by ground clearing and logging activity, and a relatively small amount of material was recovered given the amount of surface area exposed. Several chert flakes; a plain, sand tempered potsherd; and a heavily patinated slate biface indicate a Woodland and probable Archaic occupation.

38AK155. The site is characterized by a scatter of prehistoric artifacts located on a ridgeline overlooking and elevated 50' above a swampy tributary of Upper Three Runs Creek. The site extends over about half an acre and is located about one mile southeast of the intersection of road C-4 and the dirt road to area F and the Burial Grounds. The site area is disturbed by logging activity and erosion. A sand tempered, cordmarked sherd; several chert flakes; and one quartz biface fragment were recovered, indicating a Woodland occupation.

38AK156. A single sherd of sand tempered, cordmarked pottery was recovered in the roadcut of a dirt logging road east of road C-4 and parallel to the SCL railroad line. The site is located on a sandy ridge about 1500 feet south of Upper Three Runs Creek, and is elevated 50 to 75 feet above the creek swamp. A Woodland component in the immediate area is indicated.

38AK157. This site consists of a scatter of chert flakes on disturbed ground, on the slope of a low ridgeline rising to the south. A test well is located at the crest of this hill up an extensively eroded roadcut. The site centers on the junction of the dirt road, running from C-4 parallel to the SCL railroad line, and a short dirt road south to the test well. The artifacts came from an area covering about an acre in and north of this intersection. About 350 feet to the northeast, the terrain slopes to a swampy tributary of Upper Three Runs Creek. Chert flakes of undetermined age were recovered on the disturbed and eroded ground surface.

38AK158. This site is characterized by a scatter of historic and prehistoric artifacts recovered on the surface and cut face of a ridgeline elevated 40' above a tributary of Upper Three Runs Creek. It is located immediately north of the SCL railroad cut and southeast of the intersection of C-4 and the road paralleling the railroad line. The site extends over about an acre and has been somewhat disturbed by the railroad cut and erosion. Sand tempered, cord marked ceramics of the Cape Fear ware-group; chert flakes; and historic white earthenware and salt-glazed stoneware sherds indicate Woodland and 19th or 20th century components, with the possibility of earlier, Archaic occupations indicated by the flake scatter.

38AK159. 38AK159 is a scatter of prehistoric lithic artifacts located on a ridge elevated 40' above a tributary of Upper Three Runs Creek. The main channel of the creek flows about 1000 feet north of the site area. The artifacts were recovered in a small cluster in the profile of the SCL railroad line cut, southeast of the intersection of road C-4 and the road paralleling the railroad cut. Chert flakes and a biface fragment were recovered, but no period of occupation, other than prehistoric, could be determined.

38AK160. This site is characterized by a scatter of chert debitage along a heavily disturbed ridgeline overlooking a swampy tributary of Upper Three Runs Creek. The site is a small, 25 foot diameter cluster located at the end of road 4.1, north of its intersection with SRP 4. It lies about 2000 feet south of the main channel swamp, and the area has been extensively disturbed by erosion and the dirt road cutting. The lithic debitage included unmodified chert flakes, and no period of occupation could be determined.

38AK161. 38AK161 is characterized by an extensive scatter of heavily patinated chert debitage recovered along the eroding slope of a borrow area. The material was found in a tight cluster about a quarter of an acre in extent located on Burma Road (C-4). The site area overlooks a low, marshy depression that may be natural or may result from borrow operations. The main channel of Upper Three Runs Creek lies about 2/3 mile north of this site. The artifacts recovered, unmodified and unifacially retouched chert flakes, indicate a prehistoric occupation of uncertain age.

38AK162. This site is characterized by a scatter of chert debitage along the slope of a ridge defining the northern limit of a large borrow area. The site area, located about 100 feet east of 38AK161, is situated on Burma Road (C-4). Both it and 38AK161 overlook a swampy depression that may be a natural occurrence or may result from the borrow operations. This site extends over about half an acre and the artifacts recovered, unmodified and and retouched patinated chert flakes, indicate a prehistoric occupation.

38AK163. 38AK163 is characterized by a scatter of chert flakes and tools on a low ridgeline 400 feet west of Four Mile Creek. It extends over about an acre and is located between roads A-6 and A-7 immediately north of the Aiken-Barnwell county line. The material was recovered in an extensively cleared area stripped of topsoil and grown up in small regularly spaced pine trees. The area is somewhat eroded where the topsoil was removed; small gullies up to 3 feet deep are present and run toward the creek. The artifacts recovered included patinated chert flakes, both modified and unmodified, and one serrated Kirk corner-notched projectile point, indicating an Early Archaic component.

38AK164. This site consists of a scatter of prehistoric ceramic and lithic artifacts located on a ridgeline that overlooks and juts out into the floodplain of Upper Three Runs Creek. The site extends over about an acre and is located along road C-121, about 1/2 mile north of Cassel's Fire Tower. The swamp is located some 50 feet in elevation below this ridge and all of the material gathered was collected in exposed and eroded soil near the edge of the drop-off. Cord marked and plain pottery of the Cape Fear ware-group, chert and quartz flakes and tools, and a Stanly projectile point were recovered, indicating both Archaic and Woodland period components.

38AK165. This site is characterized by the discovery of a chert biface fragment located on a terrace overlooking Upper Three Runs Creek. It is elevated about 50 feet above the creek on road A-5-1. The area is somewhat disturbed by erosion. The biface fragment is broad and flat, reminiscent of a crude Savannah River stemmed fragment, but nothing other than a prehistoric component can be inferred from it.

38AK166. 38AK166 is characterized by a scatter of prehistoric lithic and ceramic artifacts recovered along the slope of a ridge on the southern edge of Upper Three Runs Creek. Materials were recovered in the cut of a logging road immediately east of road A and just south of where that road crosses Upper Three Runs Creek. The site is located on a ridge overlooking the creek swamp, and artifacts recovered included plain and linear check stamped pottery, and chert and quartz flakes. These artifacts indicate that a Woodland component is to be found in this area.

38AK167. This site is characterized by a scatter of chert flakes eroding from the top of a roadcut face along SRP A, immediately south of Upper Three Runs Creek and on the east side of the road. The roadcut passes through a ridgeline overlooking the creek, and the artifacts were recovered about 300 feet from the stream/swamp water level. The remains of several modern buildings are in the immediate area, and erosion and this pre-plant era construction appear to have disturbed the site. Several unmodified, chert, thinning flakes were recovered, indicating a prehistoric component.

38AK168. This site is characterized by a scatter of prehistoric lithic artifacts located on a ridge elevated 50 to 60 feet above Upper Three Runs Creek, which flows immediately to the north. A small tributary of the main creek channel flows to the west of the site. The site covers about a quarter of an acre and is disturbed by recent erosion and road clearing activity. The site itself is located in and near the roadcut of 4-1, just to the south of SRP road F. Artifacts recovered included chert, quartz, and quartzite flakes and indicate a prehistoric component. No diagnostic artifacts were recovered.

38AK169. 38AK169 consists of a scatter of prehistoric lithic materials recovered in the roadcut of SRP 4.1, southeast of its intersection with SRP #4. Artifacts were recovered along the road for 75'. The site is located on a ridgeline overlooking a swampy tributary of Upper Three Runs Creek; the main channel of Upper Three Runs lies about a half mile to the north of this site. Several chert flakes were recovered, indicating a prehistoric component; but no determination of specific period of occupation could be made, given the nature of the present data.

38AK170. 38AK170 consists of a scatter of chert thinning flakes observed eroding from the ground in a roadcut and adjacent gullies east of this road. The site extends over about an acre and is located south of Four Mile Creek along road A-6.1, about one mile south of area F. The site is located on a ridgeline elevated 20-25 feet above the creek swamp floor; a small tributary enters the main channel to the east of the main site area. The ground surface appears to have been disturbed by ground clearing, the roadcut, and erosion. No diagnostic artifacts were recovered, and only a prehistoric component can be inferred.

38AK171. 38AK171 is characterized by a scatter of prehistoric ceramics located in and along the cut of road A.6. The site covers about a quarter of an acre and is located on a ridgeline overlooking Twin Lakes to the south and a branch of Four Mile Creek to the west. The site area has been somewhat disturbed by the roadcut and erosion. Artifacts recovered included linear check stamped and plain ceramics, indicating a Woodland and probable Deptford component.

38AK211. This site consists of an isolated chert flake and is therefore not assignable to any cultural time period. It is located on an upland ridge nose between Upper Three Runs Creek and Tinker Creek. It is at an elevation of 230 feet and slopes to the southeast. Vegetation consists of mixed decidous (oak-hickory) and coniferous trees. Other destruction will occur only if the road is subected to further grading and erosion.

38AK212. This site is an isolated find consisting of a single chert flake and therefore it may not be assigned to a specific cultural phase or time period. It is located on a ridge or hill slope northwest of Tinker Creek. It slopes to the southeast and is at an elevation of 220 feet. Vegetation consists of conifers and mixed decidous trees. The site is currently in a dirt road and will be destroyed if additional work is done.

38AK213. Due to a lack of diagnostic artifacts it is not certain to which cultural period this site belongs. The site is located on a terrace overlooking Upper Three Runs Creek. It is at an elevation of 170 feet and slopes to the west toward Upper Three Runs Creek. The site is a small lithic scatter consisting of chert flakes resulting from bifacial retouching. Currently, the site is being used as a dirt road and will be damaged if subjected to further road grading or construction.

38AK214. As no diagnostic artifacts were found on the surface at this site it is not known to which cultural period the site may be assigned. The site is located on a terrace overlooking Upper Three Runs Creek to the west. It slopes west and is at an elevation of 170 feet. The site is a small lithic scatter consisting of chert flakes found on the surface. Currently the site is being utilized as a dirt road and has been subjected to some grading and erosion.

38AK215. This site is a small lithic scatter consisting of nine chert flakes. As no diagnostic artifacts were found in association with the surface collection, the period of this site is unknown. The site is located on a ridgeslope facing west and is at an elevation of 250 feet. Upper Three Runs Creek is located to the west of the site.

38AK216. This site is a small scatter of artifactual material belonging to the Woodland and the Historic periods and possibly one other period. Artifactual material consists of one chert flake of bifacial retouch, a Woodland period pottery sherd and two Historic period ceramic sherds. The site is situated on a ridgeslope east of Upper Three Runs Creek. It slopes west and is at an elevation of 280 feet. Currently the site is being used as a dirt road and has been somewhat damaged by erosion and grading.

38AK217. This is an Historic period site as determined by the presence of ceramics dating to this period. The site is on a ridge slope northwest of Tinker Creek. It slopes to the southeast and is at an elevation of 260 feet. The ground surface was searched intensively for other artifactual material and structures but none were located. The site has been partially disturbed by road grading and erosion.

38AK218. Surface collections from this site yielded only one chert flake and it is therefore impossible to assign this site to a specific time period. The site is located on a terrace northwest of Tinker Creek. The site slopes to the southeast and is at an elevation of 200 feet.

38AK219. This site is an historic house as determined by the presence of Historic period ceramics and other miscellaneous Historic period material such as glass. The site is located on a hillslope midway between Tinker Creek and Reedy Branch. It is at an elevation of 310 feet and slopes to the southwest. It has been partially disturbed by road and gate construction.

38AK220. This site is a Woodland habitation site with a high density of artifactual material. Surface collections resulted in the location of a large number of flakes, one broken projectile point, one piece of fire-cracked rock and numerous pottery fragments. The site is west of Tinker Creek on a terrace with some floodplain hardwood vegetation. This floodplain would have provided excellent opportunities for gardening or cultivation. The site is at an elevation of 220 feet and slopes to the southeast. The site is currently being used as a borrow pit and road and has been partially disturbed by these activities.

38AK221. Since no diagnostic artifacts were found at this site, the cultural period to which it belongs is unknown. Surface collections yielded only two chert flakes but, as no subsurface testing was done, the extent of the site is still unknown. The site is located on a terrace/floodplain edge where a rank one tributary and Tinker Creek join. It slopes to the southwest and is situated at an elevation of 220 feet. Vegetation is predominately hardwoods. The site is presently in a dirt road and has therefore been somewhat disturbed by road grading and erosion.

38AK222. Artifactual material at this site consists of a biface fragment, chert flakes and a pottery sherd. The presence and type of ceramics present are indicative of a Woodland occupation. The site is situated on the slope of a terrace near Tinker Creek floodplain. It slopes to the southeast and is at elevation of 260 feet on sandy soil. Vegetation consists of pine and hardwoods.

38AK223. This is a Woodland period site consisting of a ceramic and lithic scatter. Surface collecting yielded a fair number of chert flakes and several pottery fragments. The site is adjacent to Mill Creek at the juncture with Tinker Creek. It is at an elevation of 200 feet and slopes north. Vegetation consists of bottomland hardwood. This site is also on the boundary of a bottomland hydric zone and an upland xeric zone. The site has already received moderate to heavy disturbance resulting from road grading.

38AK224. This site is a very rich, upland multi-component site. It is located on a terrace overlooking the floodplain of Tinker Creek and Mill Creek. Elevation of the site is 200 feet and it slopes south to southwest. Vegetation consists of hardwoods (hickory and oaks) and pine.

This site is a large (400 m by 100 m minimum) lithic and ceramic scatter. Surface collections yielded a tremendous amount of chert flakes, fire cracked

rocks, pottery sherds and many small triangular points as well as two Dalton points. This would assign the site to the Early Archaic period and Woodland period. Due to the great amount of artifactual material, a day was devoted to excavating four test pits and several post holes to better determine site size and content. These test pits yielded much more artifactual material including fire-cracked rock, flakes of bifacial retouch, and pottery. Several more projectile points were also uncovered including a Palmer, Kirk, Savannah River, and Caraway. These point types indicate that the site may possibly have been occupied from the Early Archaic through to the Mississippian and possibly up until contact times.

Unfortunately a large part of this site has already been disturbed by the construction of roads and a fire cut. This has resulted in heavy erosion which is also responsible for destruction of the site.

38AK225. This site consists of only one chert flake and therefore it is not known to which cultural time period the site belongs. It slopes to the south and is at an elevation of 290 feet. It is located in the sand hills on a hill slope. The site is located in a dirt road and has been partially disturbed.

38AK226. This site is a small scatter of chert flakes. Due to the lack of diagnostic artifacts it is not known to which cultural time period the site belongs. It is located on a hillslope near a tributary of Tinker Creek. The site slopes to the southeast and is situated at an elevation of 290 feet.

38AK227. Surface collections at this site yielded only four chert flakes. The lack of diagnostic artifacts prevents assigning this site to a cultural time period. The site is on a ridge slope east of Tinker Creek. It slopes to the southeast and has an elevation of 250 feet.

38AK228. This site has been assigned to the Woodland period because of the presence of Woodland period pottery. It is a scatter of lithic and ceramic material located on a terrace at the confluence of Upper Three Runs Creek and the Savannah River. The site is at an elevation of 100 feet and the slope aspect is direct. Flora is typical of swamp vegetation including tupelo gum, cypress and water oak. The site has been disturbed by road work.

Sites in Barnwell County

38BR8. Located along the Lower Three Runs Creek and Salkehatchie River drainage divide, this prehistoric site lies in close proximity to an active spring. Although collections for this site were unavailable for analysis, field notes indicate the presence of over sixty sherds of sand and grit tempered ceramics, many of which had stamped decoration. Lithic artifacts consisted of flakes of chert and a single slate fragment. The estimated extent of the artifact scatter ranges between five and ten acres. Chronologically this site falls within the definition of the Woodland period with no evidence for an earlier occupation. In addition to the prehistoric

component at this site, some evidence for a twentieth century house site is present.

38BR9. This site is situated on a ridgetop, which prior to the construction of Par Pond, would have overlooked Lower Three Runs Creek. Scattered over approximately one acre of the ridge were artifacts from both the Woodland period (sand tempered, incised ceramics) and Historic period (pearlware and creamware). Collections from this site were unavailable for analysis, but it would appear that the site is at a minimum assignable to these two chronological periods.

38BR13. Collections for this site were made in the earliest phase of research during the 1973 season, but were unavailable for analysis at the time of report preparation. Based on the field note information and catalog forms the site exhibits evidence of Woodland and Historic occupations. Woodland artifacts include a serrated triangular point fragment, a unifacially worked tool, sand tempered sherds with cordmarked, plain and complicated stamped surface decoration and numerous chert flakes. Historic artifacts consist of pearlware, earthenware, salt-glazed stoneware and purple glass fragments.

This site is located one mile northwest of Lower Three Runs Creek on a high sand ridge. Artifactual remains are in evidence over an area of about five acres near a small tributary of Lower Three Runs Creek.

38BR14. Situated on the edge of a swampy tributary of the Salkahatchie River in the eastern portion of the Savannah River Plant, this prehistoric artifact scatter contains evidence of a Woodland occupation. The artifact collections from the site were unavailable for analysis; however, the field notes and initial artifact catalog indicate the presence of sand tempered ceramics with plain, cordmarked, check stamped and complicated stamped surface decoration; chert flakes; and, in a rare instance in the acidic soils of the Savannah River Plant, charred faunal remains. The areal extent of the site was estimated to be five acres within the plant, with portions of the site extending beyond the boundary fence. The evidence from this site would suggest an intensive utilization of the location throughout most of the Woodland period.

38BR15. This prehistoric artifact scatter lies on a flat ridge adjacent to the confluence of two headwater streams of the Reedy Branch. Field notes indicate the presence of sand tempered sherds with plain and complicated stamped surface decoration, numerous chert flakes, and a chert bifacial knife. Although no collections were available for analysis, this site would appear to be tentatively assignable to the Woodland and Mississippian periods on the basis of the ceramics. The estimated surface area of the site is between eight and ten acres based on the limits of the artifact distribution.

38BR16. Like 38BR15, this prehistoric ceramic site is within the headwaters of the Reedy Branch on a sandy hilltop. Only four sand tempered plain and incised sherds were collected from this location; however, due to the presence of extensive ground cover and pine litter it is likely that the site contains additional artifactual materials. Based on the extent of flat, habitable land the site's size was estimated at one to two acres.

38BR17. This site lies at the headwaters of the same tributary of the Salkahatchie as 38BR14 in the eastern area of the plant. Evidence from this site indicates a prehistoric Woodland and Mississippian period occupation in that ceramics are sand tempered with plain, cordmarked, check stamped and complicated stamped surface decoration. The recognized lithic assemblage consists of chert flakes and a mortar fragment. The areal extent of the site was assessed at between eight and ten acres.

38BR18. This ceramic and lithic scatter is situated on the south side of the same Salkahatchie tributary as 38BR14 and 38BR17. Artifactual remains were found on a flat ridge overlooking the stream and covered an area of approximately two acres. Based on field notes and preliminary artifact catalog the collection consists of fabric impressed ceramics, chert flakes, a chert flake core and a single small triangular projectile point fragment. The ceramics and small point fragment would indicate the site was occupied during the Woodland period.

38BR19. 38BR19 consists of an historic site situated on a flat sandy hilltop on the eastern margin of the plant. The presence of large hardwoods and the nature of the artifact collection would suggest that the site was a farm site. Artifacts consist of pearlware, creamware, stoneware, kaolin pipe fragments, and bottle fragments which cover the time range from the early nineteenth through the early twentieth centuries.

38BR31. This prehistoric lithic and ceramic scatter is located along the edge of the 100 foot terrace of the Savannah River near the point where Four Mile Creek enters the Savannah River swamp. Artifacts were found scattered along the edge of the terrace-bluff covering an area of ten to fifteen acres.

Analysis of the artifact assemblage collected from the site indicates an occupation spanning the transition from the Late Archaic period to the Early Woodland period. Of great interest is the presence of fiber tempered ceramics at the site which are indicative of the transitional Late Archaic period. The majority of the ceramics, however, are sand tempered with plain, cordmarked, check stamped and simple stamped surface decorations. Lithic artifacts include numerous chert flakes of bifacial retouch, three bifacially worked tools, a single projectile point, a grinding tool, and a hammerstone. Small fragments of undiagnostic faunal remains indicate soil conditions suitable for the preservation of important evidence for subsistence analysis, i.e. bone and shell specimens. The preservation potential of the site is further documented by Combes's field notes which state that 24 inches of midden are present.

38BR32. This site lies to the west of Four Mile Creek adjacent to swampy backwater on the 100 foot terrace of the Savannah River. Artifactual remains were, for the most part, found in test excavations below the twelve inch level indicating the area was covered by flood sands since occupation. Due to this fact, the extent of the site was estimated on the basis topographic examination to be approximately one or two acres. Collections from the site consist of chert flakes, fabric impressed, sand tempered sherds, and plain, sand tempered sherds. Based on the ceramic evidence this site has been tentatively assigned to the Woodland period.

38BR33. Like many prehistoric ceramic and lithic scatters in the sandy Aiken Plateau area of the plant, this site lies near the headwaters of two small tributaries, in this case of Mill Creek. The scatter is present along a hilltop and is approximately three acres in size. Since no collections exist from this site the only determination of chronological affiliation can be derived from the field notes. Ceramics of undetermined type and lithic flakes were mentioned. The presence of other possible site debris (fire-cracked rock) may indicate a large site size but this determination must await further on-site examination. The only conclusions relating to this site are that a Woodland occupation is suggested.

38BR35. The location of this prehistoric ceramic and lithic scatter is along a high terrace immediately east of Four Mile Creek. Artifacts were found scattered for 200 meters along the terrace. The collected artifact assemblage consists of chert flakes of bifacial retouch, and sand tempered sherds with cordmarked and check stamped surface decoration. Due to the site's proximity to the terrace edge, little historic disturbance has occurred, suggesting that the site may have intact cultural deposits. On the basis of the artifactual analysis the site has been assigned to the Woodland period.

38BR36. 38BR36 lies on the edge of the 100 foot terrace immediately west of the Pen Branch and consists of ceramic and lithic artifacts covering approximately two acres. Test excavations at the location by Combes indicate that the site has a depth of three meters with moderate artifact density throughout.

Artifactual evidence from the surface collection and test pit consist of flakes of bifacial retouch, two chert flake cores, a projectile point fragment, two bifacially worked tools, and sand tempered ceramics with check stamped and cordmarked surface decoration. Based on these materials the site would seem to be attributable to a Woodland period occupation. Brick, glass, and stoneware ceramics suggest an historic occupation during the twentieth century.

38BR37. This prehistoric lithic and ceramic scatter located at the confluence of the Pen Branch and the Savannah River swamp was estimated by Combes to cover an area of approximately 100 acres. The site may be the remains of a large village which occupied the entire peninsular terrace between the creek and swamp. Shovel testing indicates that the site has a maximal depth of one meter over most of its area; however, much of the deposition may be due to regular flooding of the terrace by seasonal floods.

The inventory recovered from the site consists of flakes of bifacial retouch, two bifacially worked tools, a grinding implement, a unifacial scraper, and sand tempered sherds with plain, cordmarked and check stamped surface decoration. This evidence strongly suggests an occupation restricted to the Woodland period.

38BR38. This lithic scatter, consisting solely of flakes of bifacial retouch, is located to the west of the Pen Branch on a large flat terrace. The area of the scatter extends for 800 meters N-S by 800 meters E-W covering most of the dry land in this predominantly swampy area. Since no diagnostic

artifacts were found at the site, the determination of chronological age cannot be accurately ajudged; however, the absence of ceramics in this terrace context where ceramic remains are commonly present may indicate that the site pre-dates the use of ceramics.

38BR39. Located on a portion of terrace adjacent to the Savannah River swamp, this prehistoric and historic site has yielded evidence of intensive occupation. Although the surface collection of artifacts from the site was primarily of the Historic period, subsurface testing by Combes documented the presence of a buried Woodland horizon .6 meters below modern ground surface. Since the prehistoric component of the site is buried an accurate estimate of its size cannot be determined; however, based on the limits of the on-site landform a tentative estimate of 80 by 100 meters is assigned.

Artifacts of the prehistoric occupation consist of chert flakes of bifacial retouch, a projectile point fragment and sand tempered sherds with cordmarked and check stamped decoration. Historic artifacts consist of pearlware, stoneware, porcelain, ironstone ware, bottle glass, and various metal fragments. The prehistoric artifacts represent a Woodland occupation, while the historic materials seem to date from the nineteenth and early twentieth centurirs.

38BR40. 38BR40 lies along the 100 foot terrace adjacent to the Savannah River swamp between the Pen Branch and Steel Creek. The site is a prehistoric scatter approximately 40 meters by 120 meters. Artifactual remains from the surface and test pit excavations consist of numerous chert flakes of bifacial retouch, bifacially worked tooks, 3 Kirk projectile points, and one triangular point. These artifacts indicate that the occupation of the site occurred during the Early Archaic period.

38BR41. This historic and prehistoric artifact scatter covers an area of indeterminant size along the edge of the Savannah River swamp between Pen Branch and Steel Creek. As in the case of 38BR40 this swamp edge location shows evidence of intensive occupation during the Woodland and earlier periods, as well as the Historic period.

The artifact collections from the site indicative of prehistoric occupations consist of numerous flakes of bifacial retouch, six bifacially worked tools, three projectile point fragments, and sand tempered sherds with cordmarked, check stamped and simple stamped surface decoration. These artifacts were obtained from both surface collections and two test pits excavated by Combes. Historic materials collected from the site include pearlware, creamware, stoneware, kaolin pipe fragments, and bottle glass. Preliminary analysis suggests an occupation during the nineteenth and early twentieth centuries.

38BR42. This site is a multi-component lithic and ceramic scatter situated along the edge of the Savannah River swamp near 38BR37 and 38BR41. The site size is estimated at 80 meters by 100 meters. Materials from the site consist of numerous flakes of bifacial retouch, a fragment of steatite, five projectile points (Palmer and triangular), and sand tempered sherds with plain, cordmarked, simple stamped and check stamped decoration. These materials indicate occupations of the location during the Middle Archaic and Woodland

periods. A possible Late Archaic occupation may be inferred based on the presence of steatite which was usually used during the period for stone bowls and other artifacts prior to the adoption of ceramics.

38BR43. This large ceramic and lithic scatter covers an area approximately 800 meters by 800 meters on the west terrace of the Pen Branch near 38BR38. Sand tempered sherds with cordmarked, plain and check stamped decoration indicate a Woodland period occupation. Lithic debris at this site is plentiful in the form of over 700 flakes of bifacial retouch, a bifacially worked tool, and two projectile point fragments.

38BR44. Historic and prehistoric artifacts are scattered over an area 1500 meters by 1500 meters indicating that 38BR44 was an extensively utilized location. The site is situated along a terrace which overlooks Steel Creek to the east. Controlled surface collections of the site revealed the following prehistoric artifact classes: flakes of bifacial retouch, two bifacially worked tools, three projectile points (1 Palmer), and some primary lithic debris. The evidence indicates a prehistoric occupation restricted to the Early Archaic period. Historic remains (such as pearlware, creamware, stoneware and bottle glass) indicate an eighteenth century occupation.

38BR45. This scatter of lithics and ceramics is situated north of the S.C.L. railroad and west of Steel Creek. Surface collections include flakes of bifacial retouch and two sherds of undiagnostic sand tempered pottery. These materials are restricted to a one by one meter area of the terrace.

38BR47. This moderate sized lithic and historic artifact scatter lies to the east of the Pen Branch on a flat terrace. The estimated size of the site is 100 meters by 130 meters. The historic materials are indicative of a twentieth century occupation probably extending to the abandoment of the area prior to the construction of the Savannah River Plant. Prehistoric materials, on the other hand, consist of chert flakes of bifacial retouch and a Morrow Mountain point which are attributable to a Middle Archaic occupation.

38BR48. This one by one meter scatter of lithic and historic debris is located in the extreme northeastern portion of the plant on the drainage divide between Upper Three Runs Creek and the Salkahatchie River. Only chert flakes were recovered from the site along with historic ceramics and glass dating from the twentieth century.

38BR49. The presence of a single uniface from this upland hilltop location is the sole evidence of human activity. The hilltop overlooks a large tributary of Tinker Creek to the east and may have been used as an observation position for hunting, although such an inference is tentative.

38BR54. 38BR54 is characterized by a scatter of prehistoric and historic artifacts located on a small series of ridges west of and overlooking at an elevation of from 20 to 40 feet the channel and swamp of Four Mile Creek. The site extends over a distance of several acres and has been heavily disturbed by erosion, timbering and pine planting activity. The site area is located adjacent to and south of road A-7 before that road crosses Four Mile Creek.

Artifacts recovered included a pitted anvil/metate, unmodified chert and quartzite flakes and ironstone earthenware and stoneware historic ceramics, indicating prehistoric and relatively recent historic components in the area.

38BR55. This site is characterized by a scatter of prehistoric lithic and ceramic artifacts recovered for 400 feet along the cut of a dirt road immediately overlooking Meyers Branch swamp, and in a powerline cut clearing immediately north of the junction of Meyer's Branch and Steel Creek. The site is on a ridgeline overlooking and elevated 25-30 feet above Meyer's Branch, which is directly south of the site. Artifacts recovered included ceramics and chert flakes and tools. The artifacts indicate several Woodland period components are present in the immediate area.

38BR56. 38BR56 consists of a scatter of chert debitage on a ridge to the east of and overlooking Steel Creek. Artifacts were recovered in and near a roadcut north of the SCL railroad line. The site is about a quarter of an acre in extent and is situated on ground that had been extensively disturbed by both roadscraping and the construction of the railroad line. The artifacts recovered--chert thinning flakes--indicate a prehistoric component of undetermined age.

38BR57. This site is characterized by the occurrence of a single chert flake and a scatter of recent historic ceramics and other debris located on the west side of route 4 where the road crosses Four Mile Creek. The materials were observed eroding from the roadcut bank; the immediate area appears to have been disturbed by logging, in addition to the road construction activity. The nature of the artifacts recovered indicate a prehistoric component, and a recent, probably 20th century component.

38BR58. 38BR58 is characterized by a scatter of prehistoric artifacts along the slope of the roadcut for SRP 3. The site is located north of Road 3 and west of Four Mile Creek. The site area extends along the slope of a ridgeline that is elevated 30-40 feet above the swamp. The area has been disturbed by the roadcut, erosion, and logging. Artifacts recovered included simple stamped and plain, sand tempered ceramics and chert flakes, indicating a Woodland component.

38BR59. 38BR59 consists of a scatter of prehistoric sherds and flakes located on the side and top of an eroding bank where the roadcut for SRP 3 had been made. The site area is located on the south side of SRP 3 and west of the intersection of 3 with Four Mile Creek. All material was recovered from within 300 to 100 feet of the creek on a ridgeline elevated from 20 to 30 feet above the creek surface. 38BR58 is immediately across the roadcut and is a part of this site. The site area appears to have been disturbed by erosion, logging, and the roadcut. Artifacts recovered include linear check stamped and plain pottery, and chert thinning flakes, indicating a Woodland, and probably Deptford component.

38BR60. 38BR60 consists of one heavily patinated chert flake and one sherd of modern porcelain recovered in the eroding roadcut bank on the west side of SRP 5, north of the "C" line railroad tracks. The site area is 200 feet north of a small tributary of Four Mile Creek, and is located on

disturbed ground between areas CS and C. The artifacts recovered indicate an unknown period prehistoric occupation and a recent historic component. The site is on a small ridgeline elevated about 10 feet above the creek.

38BR61. This site consists of a scatter of lithic debitage on the exposed surface of a ridgeline overlooking and elevated 50 feet above the Four Mile Creek swamp. The site area has been recently cleared and is presently planted in pine saplings. The site extends over about an acre along a ridgeline immediately east of Four Mile Creek, to the north of SRP A-7.

38BR62. The site is characterized by a scatter of historic and prehistoric artifacts on a low ridgeline immediately west of and overlooking Four Mile Creek. The site area extends over about two acres and is located on the west side of Four Mile Creek. The area has been disturbed by road scraping and erosion. Artifacts recovered included chert flakes, fabric marked pottery of the Cape Fear ware-group, and white stoneware and glass, indicating a prehistoric Woodland and possibly Archaic components, and a probable modern component.

38BR63. 38BR63 was characterized by a scatter of chert flakes on exposed and eroding ground on a ridgeline immediately west of and overlooking Four Mile Creek. The site area is located in the roadcuts of A-10 and A-9 up to 400 feet from the creek. The area is heavily disturbed by clearing operations and erosion. Artifacts recovered included undmodified and retouched chert flakes, and indicate a prehistoric component of unknown age.

38BR64. This site is characterized by the occurrence of a single retouched chert flake on a low ridge, about a mile west of Four Mile Creek. The artifact was recovered in the cut of an access road to a borrow pit off Stewart Road just east of its intersection with A.8. The flake indicates a prehistoric component in the area, but no additional material was observed on the surface.

38BR65. 38BR65 is characterized by a scatter of chert flakes exposed around the edge of a borrow area on a ridgeline east of and elevated 30 to 60 feet above Four Mile Creek. The site area extended for about 200 feet along the ridge on land just south of road 6.3. The area is heavily disturbed by the borrow operation, and the exposed surfaces are highly eroded. The artifacts recovered, unmodified and retouched chert flakes, indicate a prehistoric component or components of unknown age.

38BR66. This site is characterized by the occurrence of a single chert biface fragment recovered in the cut of road 6.5. The site is on a low rise in uplands, several hundred yards north of Indian Grove Creek. The site area is disturbed by the roadcut and ground clearing operations. The biface recovered appears to be a triangular point, indicating a Woodland component. The isolated site location, and the lack of additional material, suggests that a single behavioral event is represented in the data.

38BR67. This site was determined by the recovery of one sherd of sand tempered, plain prehistoric pottery from the surface of a ridgeline 25 feet above and 400 feet southeast of a branch of Four Mile Creek. It has been disturbed by roadgrading operations and some terracing, possibly caused by logging operations for erosion control. A Woodland period component is indicated by the recovery of the pottery.

38BR68. This site consists of a single flake of chert recovered from a cut of a firebreak on the edge of small swampy depression. The material was recovered in a firebreak about 10 feet west of the swamp. The area has been disturbed by ground clearing activity. The presence of the chert flake indicates that a prehistoric component is present, but nothing more conclusive can presently be determined from that data.

38BR69. 38BR69 consists of a scatter of prehistoric lithic artifacts recovered in the profile of a roadcut through a ridgeline immediately northwest of small tributary of Pen Branch Creek. The site extends over about a quarter of an acre and is located southeast of the intersection of Roads C and 6. The area is elevated from 30 to 40 feet above the tributary swamp, and has been disturbed by erosion. The chert flakes indicate a prehistoric component, but are not diagnostic temporal indicators.

38BR70. This site is characterized by a scatter of prehistoric chert flakes and ceramics recovered over an area of about an acre, on and near road C-6. The site area has been disturbed by the construction of firebreaks, logging operations, and roadcuts. The location is on a ridge 30 feet above and to the northeast of a swampy tributary of Pen Branch Creek. Plain, sand tempered ceramics and retouched and unmodified chert flakes were recovered, indicating at a minimum a Woodland component, although others may be present.

38BR71. This site is characterized by a scatter of chert thinning flakes, most of which are flakes of bifacial retouch, that were recovered along the slope of a ridgeline overlooking a marshy tributary of Pen Branch. Site 38BR72 is located on a ridge on the opposite side of the tributary, some 800 feet south, and had a similar artifact assemblage. The ridgeline on which the site is located slopes gently to the creek, and most of the material recovered was about 300 feet from the creek at an elevation of 30 feet above it. The site area extends over about a quarter of an acre and is located along Road C-6, immediately south of road C. The artifacts recovered indicate a prehistoric component of unknown affinity.

38BR72. This site consists of a scatter of prehistoric chert flakes recovered in and near the roadcut of C-6. The site area is located on a ridgeline south of and overlooking at an elevation of 40 to 60 feet a swampy tributary of Pen Branch Creek. Most of the material was recovered on eroded and cleared ground located east of the road; the site area extended over several acres. The artifacts recovered--highly patinated chert flakes--indicate a prehistoric, possibly Archaic component.

38BR73. 38BR73 consists of a scatter of chert flakes located in exposed soil on a low ridge 200 feet north of a low swampy marsh that forms a tributary of Indian Grove Creek. The immediate area has been burned. The site area was a tight cluster of flakes about 50 feet in diameter located on the ridge edge, 15 feet above the swamp. The area is located in the immediate vicinity of Moody road approximately 1/4 mile southeast of SRP 6. The chert flakes that were recovered were not diagnostic as to which temporal period the site belongs.

38BR74. This site is characterized by a scatter of chert flakes recovered over about a quarter of acre of ground on a low ridge immediately north of a swampy tributary of Indian Grove Branch. Artifacts were observed eroding from

the bank of a powerline cut in an area disturbed by ground clearing and erosion. The site is located 1/4 mile north of K area under power transmission line, about 100-150' north of the tributary. Artifacts recovered consisted of chert thinning flakes, indicating a prehistoric component.

38BR75. 38BR75 is characterized by a scatter of chert artifacts along the slope of a ridge, 800 feet east of and overlooking Indian Grove Branch. This site is 20 to 30 feet above the creek. The site area is located on the north side of SRP road B, and about a thousand feet south of the hot water outlet. The artifacts recovered, unifacially retouched and unmodified chert flakes, were collected in the eroding roadcut of B. A prehistoric component of unknown period is indicated.

38BR76. This site is a scatter of chert thinning flakes recovered in the eroding top and side of the roadcut for SRP B, on the south side of the road. The site area was located on a ridgeline from 300 to 400 feet east of Pen Branch Creek, on land elevated 20 to 30 feet above the water level. Artifacts were recovered along a 100 foot section of the roadcut and were noted eroding from the upper 12 inches of the soil profile, a yellowish-brown sand layer underlain by orange sand-clay. The roadcut for SRP B appears to have been logged in the past. The artifacts recovered, chert thinning flakes, indicate a prehistoric component of undetermined age.

38BR77. This site, located immediately across SRP B from 38BR76, is characterized by a scatter of prehistoric chert and ceramic artifacts. The site was determined by the recovery of artifacts eroding from the cut for road B. It extends over a quarter of an acre and is located on a ridge 20-30 feet above and about 300 feet east of Pen Branch. Cord-marked Cape Fear ceramics and chert thinning flakes indicate a Woodland component on the ridgeline, although other components may also be present.

38BR78. A scatter of chert flakes and prehistoric sand tempered sherds characterized this site, which is located on a ridge immediately east of and elevated 25-45 feet above Pen Branch. The site area extends over about half an acre of ground surface that has been disturbed by a roadcut and vegetation clearing. The site is located in a 115 kv power transmission line cut. The artifacts recovered indicate that a Woodland component is present; the chert flakes, some thermally altered, may be associated with the Woodland component or may be part of another component.

38BR79. 38BR79 is characterized by a single, patinated chert thinning flake recovered in the roadcut of E-1 on a ridge overlooking Four Mile Creek. The site area is elevated about 40 feet above the creek swamp, and is located to the south of the creek. No additional materials were observed in the area, and only a prehistoric component can be inferred.

38BR80. This site consists of a scatter of prehistoric chert flakes recovered on a ridgeline overlooking the junction of a tributary of Four Mile Creek with the main channel. The artifacts were recovered in a tight concentration about five feet in diameter in the cut of a dirt logging road. The site area is elevated some 40 feet above the creek swamp in an area somewhat disturbed by logging and roadgrading. The artifacts recovered consisted of unmodified chert flakes, and indicate a prehistoric component in the area.

38BR81. This site is characterized by the recovery of single, chert, steep-angled endscraper fragment on a ridgeline to the east of and 10 feet in elevation above a tributary of Four Mile Creek. The artifact was recovered in the roadcut for Old House Road. The site area is somewhat disturbed by roadgrading and previous ground clearing activity. The endscraper, which was thermally altered, is heavily patinated and suggests an Archaic component.

38BR82. 38BR82 is characterized by the occurrence of a single flake of chert recovered on Old House Road, in a firebreak. The site area is located on a ridge to the south of and elevated 10 feet above the swampy main channel of Four Mile Creek. The area is located at the junction of a tributary with the main creek channel in an area somewhat disturbed by logging activity. The artifact recovered indicates a prehistoric component is located in the immediate vicinity.

38BR83. This site is a scatter of historic and prehistoric artifacts recovered on Old House Road. It is on a ridge south of Four Mile Creek and overlooks both the creek and two swampy tributaries of the main channel. The site area extends over about one acre, and artifacts were recovered on exposed and eroding ground surfaces on and near the roadcut. Firebreaks running through the woods in this area produced some material, and the results of the road construction and recent logging have disturbed quite a bit of the surface. The artifacts recovered included chert thinning flakes and white earthenware sherds, indicating prehistoric and modern components.

38BR84. This site consists of a single chert thinning flake recovered in the cut of a firebreak on a ridgeline south of and overlooking, at an elevation of 20 feet, the swamp of Four Mile Creek. The site area is located in an area disturbed by logging activity. The artifact recovered indicates that a prehistoric component of an unknown age is in the area, but additional work would be needed to locate it more precisely.

38BR85. 38BR85 consists of a scatter of highly patinated chert flakes that were recovered on a ridgeline east of and overlooking a swampy tributary of Four Mile Creek. All of the material was recovered in a small cluster about five feet in diameter on Old House Road, about a quarter of a mile west of road F. All of the artifacts were recovered in the roadcut itself; the nature of these chert thinning flakes indicates a prehistoric occupation although little about the age or nature of the site can be inferred from the present sample.

38BR86. This site is characterized by a scatter of historic and prehistoric artifacts over four or more acres of ground located 1/4 mile east from SRP road F. The artifacts were recovered along the road surface in the vicinity of the deerstand, and to the south of this road both in and to the west of a firebreak that parallels a swampy tributary further east. This swampy area drains into Four Mile Creek, and is located about 10 feet in elevation below the site. Clear-cutting and burning, fire break cutting, and heavy equipment maneuvering have all altered the soils on the site. Artifacts recovered included historic stoneware, creamware, and pearlware, as well as wine bottle glass, indicating an 18th and possibly 19th century historic component. Prehistoric artifacts recovered included quartz and chert flakes and tools, and plain sand tempered pottery. Unifacial and bifacial tools indicate an Archaic component. The

base of a Thelma-like point and a hafted, steep angled endscraper were recovered. The site appears to have several components, both historic and prehistoric.

38BR87. This site was characterized by a scatter of chert artifacts exposed along the shoulders of SRP route F where this road cuts through a ridge. The site area is located 1/3 of a mile from the intersection of SRP F and SRP 7, on a ridge overlooking a swamp. This swampy area is about 20 feet lower in elevation than the site area, and is located to the south and east of the site. The site has been disturbed by timbering and erosion and the road construction associated with SRP F. Artifacts recovered include retouched and unmodified chert flakes, most of which were intentionally thermally altered, and these indicate that a prehistoric, possibly Archaic component is in the area.

38BR88. This site is characterized by the recovery of two chert flakes from the eroding roadbank on the east side of SRP F, southeast of a swampy tributary of Pen Branch Creek. 38BR87 is located to the north, on the opposite side of this swamp. The flakes were close together and the site area was located west of the junction of SRP 7 and SRP F. Small, heavily weathered quartz pebbles were noted eroding from the roadcut bank, in the orange sandy-clay below the artifact bearing yellow-brown, sandy, upper layers. The area is heavily eroded and disturbed from past logging and road construction activity. The chert flakes included one flake of bifacial retouch and a thermally altered bifacially retouched flake. A prehistoric component of unknown age can be inferred from the data.

38BR89. 38BR89 consists of two unmodified, heavily patinated chert thinning flakes recovered in an old farm field on a ridgeline east of and overlooking a tributary of Steel Creek. The field is about 30 feet in elevation above the swamp and the ground surface was quite free of vegetation. No additional materials, other than recent whiteware and ironstone were noted. The site is located about a quarter of a mile west of Pond 2. A prehistoric component is indicated, but little else can be determined at the present.

38BR90. This site consists of a single chert thinning flake recovered on a ridgeline located east of and overlooking the swamp of a tributary of Steel Creek. The site area is north of Pond 2 and west of road 7. It is on eroded and timbered ground elevated 30-40 feet above the creek swamp. The single flake indicates a prehistoric component.

38BR91. 38BR91 is characterized by a scatter of prehistoric sherds and flakes on a ridgeline west of and overlooking Steel Creek. The site area extends over about a quarter of an acre and is located along the cut of a logging road near the eastern end and south from C-8. The area away from the road cut was extremely overgrown, and materials probably occure elsewhere on the ridgeline. Artifacts recovered included accidentally and intentionally thermally altered chert flakes, and nondiagnostic sand-tempered ceramics. A Woodland and possibly Archaic occupation is inferred.

38BR92. This site is a scatter of historic and prehistoric artifacts in the cut of a logging road located on a ridge about 3/4 of a mile east of Steel Creek. The site area is located 1/3 of a mile north of the Dunbarton

fire tower. Artifacts recovered included a single chert thinning flake, a kaolin pipe stem fragment, and pearlware and white earthenware ceramics. These suggest a historic component of late 18th or early to middle 19th century age, and a prehistoric component of unknown age in the area.

38BR93. A single massive (355 grams) blocky chert core, located on exposed ground on the edge of a large borrow pit was found at this site. The heavily patinated core was found on the northern edge of this borrow area; two other sites, 38BR94 and 38BR95 were found in and near the access road to this borrow pit, to the east of this site. The ridge in this area is immediately east of and elevated 50 or 60 feet above Steel Creek. The disturbed nature of the borrow area and the highly eroded ground surface on which the core was found make this find somewhat suspect; nevertheless a prehistoric component in the area is indicated.

38BR94. 38BR94 consists of an exposure of two patinated chert flakes recovered within five feet of each other in a roadbed along a ridge east of and 50-60 feet above Steel Creek. The site area is located about 3/4 of a mile northwest of the Dunbarton Fire Tower. The road was scraped and leads to a large borrow pit. The artifacts recovered, unmodified chert flakes, indicate a prehistoric component.

38BR95. This site consists of a scatter of chert flakes and tools observed in and near a dirt road leading to a large eroded borrow pit. The site area extends for 200 feet along the road. The area is a ridgeline east of and overlooking at an elevation of 50-60 feet the Steel Creek channel and swamp. The area is highly disturbed by road construction, borrow pit activity, and erosion. Artifacts recovered included chert flakes, a core fragment, and an intentionally thermally altered biface similar to a Kirk stemmed point. An Archaic component is indicated by the material recovered.

38BR96. This site is characterized by the presence of a single sand-tempered, plain rimsherd recovered in the cut of a logging road on the western edge of Indian Grove Branch. The site area is on a ridge elevated 20 feet above the creek; Pen Branch and Indian Grove Branch converge east of the site. The area is heavily overgrown and may have additional material. A Woodland period component is indicated.

38BR97. 38BR97 is characterized by a scatter of prehistoric flakes and sherds located about 200 feet south of 38BR96 in a roadcut along the western edge of Indian Grove Branch. The site area is located on a ridge elevated 20-30 feet above the creek swamp. The site is a small cluster, about 40 feet in diameter, located south of the confluence of Indian Grove and Pen Branches. The artifacts recovered included chert thinning flakes and a sherd of Deptford linear check stamped pottery, indicating a Woodland component in the area.

38BR98. This site consists of a scatter of heavily patinated chert thinning flakes located from 100 to 300 feet east of Pen Branch on a ridge elevated 20 to 30 feet above the creek. The site area extends for 200 feet along the north side of the roadcut for road 125, where the road cuts through the ridge and exposes a profile. The site area may be undisturbed on the ridgeline away from the roadcut. The artifacts recovered indicate a prehistoric component although little else can be determined at the present from the data.

38BR99. This site consits of a scatter of chert debitage located in the roadcut for B-3. The site area extends over about a quarter of an acre and is located on a ridge to the south of Pen Branch. The ridgeline has been disturbed by erosion, road clearing and cutting, and firebreaks. The artifacts recovered, chert thinning and cortical flakes, indicate a prehistoric component.

38BR100. This site was characterized by a scatter of chert debitage recovered in the eroding profile of the northern wall of a large borrow area. The site was located on a ridge elevated about 50 feet above and to the west of Pen Branch. All of the artifacts recovered were chert flakes, indicating a prehistoric component of unknown affinity. The borrow area and its surroundings are highly disturbed and eroded.

38BR101. This site consists of about a two acre scatter of brick, glass and boards representing the remains of a large mansion and outbuildings apparently destroyed when the Atomic Energy Commission occupied the plant area. A road between deer stands cut through the site. West of the road is the house site and to the east are the remains of outbuildings. The brick front steps of the house are intact and are flanked by very large magnolia trees. The site area is on a ridge overlooking and west of Steel Creek. The age of this site, called Ashley Plantation by plant personnel, is unknown but would appear to be 19th century. No artifacts were collected, although a profusion of late 19th century and 20th century debris was to be seen.

38BR102. This site is characterized by a scatter of chert flakes recovered in exposed and eroding surface areas along the slope of a ridgeline overlooking Steel Creek. The creek is located 200 feet to the east and about 20 feet in elevation below the site area. The artifacts were found in a tight cluster about 20 feet in diameter, immediately under a powerline corridor. Artifacts recovered were chert thinning flakes and indicate a prehistoric component.

38BR103. 38BR103 is characterized by the occurrence of a single chert flake recovered in the cut of a dirt logging road on a ridge west of Steel Creek. The flake was recovered about 1,000 feet west of and 40 feet above the swamp. No additional prehistoric material was recovered, although modern debris, including a rusty plow blade, indicate the area may have been farmed. A prehistoric component is indicated.

38BR104. 38BR104 is characterized by an extensive scatter of prehistoric lithic debris and some historical material located on a ridgeline immediately west of Steel Creek, and elevated about 50 feet above it. The site area extends over about two acres and materials were recovered in the cuts of access roads to the Seaboard Coast Railroad line, and from the railroad bed profile. The site area is between Steel Creek and road 125, and has been heavily disturbed by the construction activity in the vicinity. Artifacts recovered included chert thinning flakes, a steatite fragment, a large chert bifacial core, and a wine bottle fragment. These indicate a probable Archaic component as well as an early historic component of the late 18th or early 19th century in the area.

38BR105. This site consists of a scatter of chert debitage recovered on the northern shoulders of SRP A and along a dirt road intersecting it

from the east. The site area extends over about four acres and is located about 1/3 of a mile north of the intersection of A and the Seaboard Coast Line railroad. The site area is on a ridge about 1/4 of a mile west of Steel Creek, and overlooks a swampy depression immediately to the west, across A. The area has been disturbed by roadcuts, drainage ditches, and erosion. The artifacts recovered included chert flakes, both unmodified and exhibiting unifacial retouch, and indicate a prehistoric component.

38BR106. 38BR106 was recognized by the recovery of two chert flakes recovered along the northeast rim of a borrow pit. The borrow area is located in a ridgeline 1/3 of a mile north of and elevated 45 feet above Steel Creek. The site area is about 40 feet in diameter and has been disturbed by borrow operations. The artifacts recovered, chert thinning flakes, indicate that a prehistoric component is in the area.

38BR107. This site is characterized by a scatter of chert and ceramic prehistoric artifacts recovered on a ridgeline immediately east of Steel Creek, and elevated from 20 to 40 feet above it. Artifacts were recovered in or near road B-4. The site area has been disturbed by erosion, road-cutting, and ground clearing for the transmission line corridor B-4. A plain, sand tempered sherd and unmodified chert flakes were recovered, indicating a Woodland and possibly an Archaic component in the area.

38BR108. This site is characterized by a scatter of chert and quartzite flakes and tools recovered on disturbed ground surface from 200 to 500 feet east of Steel Creek. The site is on a ridge elevated 20 to 50 feet above the water level. The site area extends over about 2 acres and has been heavily disturbed by erosion and equipment manuevering. It is located at the southwest end of road B-4. Artifacts recovered included chert and quartzite flakes and the base of a Savannah River stemmed point, indicating an Archaic component.

38BR109. 38BR109 consists of a scatter of prehistoric lithic and ceramic artifacts recovered on a ridge northwest of and 20 to 30 feet above the channel and swamp of Meyers Branch. The site area extends over about 1/4 of an acre; artifacts were recovered in an access roadcut and along the SCL railroad bed. U.S.G.S. benchmark 100 1961 is located 50 feet from the site. Artifacts recovered included one sand tempered cord-marked sherd and a number of heavily patinated chert flakes, indicating Woodland and possibly Archaic components.

38BR110. 38BR110 consists of a single unifacially retouched flake of thermally altered chert that was recovered in an eroding roadcut surface 200 feet west of a railroad crossing. The site area is located on a ridge 500 feet north of Meyers Branch; immediately to the west is a low swampy depression. The site area is heavily disturbed by grading and equipment maneuvering; no other material was observed in the area. The chert flake recovered indicates a prehistoric component.

38BR111. This site is characterized by the occurrence of a single chert flake recovered in the cut of a drainage ditch along a ridge east of SRP 9. The ridge is elevated about 40 feet above Meyers Branch and immediately to the south of it. The site area is disturbed by erosion and the drainage cutting.

The remains of a recent structure are located in the immediate area, representing a house site destroyed at the time of construction of the plant complex.

38BR112. 38BR112 is characterized by a scatter of prehistoric and historic artifacts recovered in a logging roadcut along the eastern edge of Steel Creek. The site area extends for 200 feet along the roadcut, and is located on a ridge southeast of the confluence of Steel Creek and Meyers Branch. Artifacts recovered included modified and unmodified chert flakes, a 3/4 grooved axe fragment, and historic ironstone, whiteware, and stoneware ceramics and green glass fragments. The artifacts indicate that a prehistoric, possibly Archaic component is present, as well as a historic component of the 19th or 20th centuries.

38BR113. This site consistsof a scatter of chert thinning flakes recovered along a 30 feet stretch of the roadcut on the north side of SRPA. The site area is on the east side of Steel Creek on a ridge 40 feet above and 400 feet from the creek. The artifacts were recovered in an exposed and eroding bank where SRP A cut throuhg the ridgeline. The artifacts recovered consisted of unmodified chert thinning flakes and indicate a prehistoric component. All the material appears to have come from a single piece of chert, and may represent a single behavioral event.

38BR150. This site consits of a small 2m by 2m scatter of historic ceramics. It is located on a hillslope near Reedy Branch. The site slopes to the south and is situated at an elevation of 280 feet. No subsurface testing was done.

38BR151. This site is characterized by a single chert flake. Because of this, it is unknown to which cultural period this site belongs. The site is located on a hillslope with its associated drainage system being the Reedy Branch Creek. It slopes south and is at an elevation of 240 feet. The site is currently in a dirt road and has been partially disturbed by road grading and erosion.

38BR152. This site consists of a very small scatter of historic material. The site is situated on a hillslope south of Reedy Branch. It slopes north and is at an elevation of 300 feet. Although the site was searched thoroughly, no other material was found. No subsurface testing was done. The site already has been partially disturbed by road grading and erosion.

38BR153. Artifactual material at this site consists of two chert flakes. Because there are no diagnostic artifacts the cultural period to which this site belongs cannot be determined. The site is a small scatter measuring about 2 by 2 meters. Although a careful and intensive search was made of the area, no more than two chert flakes were located. The site is on a hillslope near Lower Three Runs Creek. It slopes to the northeast and is at an elevation of 200 feet. The site is currently on a dirt road and has therefore been subjected to road grading and erosion.

38BR154. Surface collections from this site yielded only one chert flake and for this reason the site is presently undatable. An intensive search of the area revealed no other artifactual material although some may be present beneath the surface. No subsurface testing was done here. It is on a hillslope west of Lower Three Runs Creek and slopes to the east. The site is at an elevation of 230 feet.

38BR155. This site is a small lithic scatter consisting of two chert flakes. The absence of any diagnostic artifacts prohibits placing this site into the chronology. The site is located to the west of Lower Three Runs Creek on a hilltop. The slope aspect is direct and has an elevation of 260 feet.

38BR156. This site consists of one chert flake. The area was intensively searched for additional artifactual material but none was located. Lack of diagnostic artifacts prevents the placement of this site in a cultural time period. The site slopes to the northwest and is at an elevation of 240 feet. It is on a hillslope and is west of Lower Three Runs Creek.

38BR157. Surface collections from this site yielded only one chert flake and for this reason, the site is presently undatable. An intensive search of the area revealed no other artifactual material although the possibility of buried cultural material is present. It has been partially disturbed by road grading. The site is on a hillslope northwest of a tributary of Lower Three Runs Creek. It slopes to the southeast and is situated at an elevation of 170 feet.

38BR158. This site is a prehistoric lithic scatter that is currently undatable due to the nature of the artifactual material which was recovered. Cultural material consists of three chert flakes. The site is on a hillslope northwest of a tributary of Lower Three Runs Creek. The slope aspect is direct and is at an elevation of 210 feet.

38BR159. This site is an historic site as evidenced by the location of Historic period ceramics. Although the area was intensively searched no evidence of structures was visible. There is a possibility that a structure of some type exists buried beneath the surface. The site is on a hillslope butslope aspect is direct. It is northwest of a tributary of Three Runs Creek and is situated at an elevation of 210 feet.

38BR160. This site is a small prehistoric lithic scatter measuring about 30 by 7 m. It consists of ten chert flakes which are the result of bifacial retouching, and one chert uniface. Since no diagnostic artifacts were found in association with this scatter, it is presently undatable. The site is on a hillslope west of Lower Three Runs Creek. It slopes to the southwest and is at an elevation of 230 feet. The site has been exposed where a dirt road was cut and has therefore been partially damaged.

38BR161. This site is a small lithic scatter consisting of four chert flakes and a chert Palmer point. It is an Early Archaic site as evidenced by the presence of the Palmer point. The site is on a hillslope and is northeast of an unnamed tributary of Boggy Gut Creek. It slopes to the east and is at an elevation of 320 feet.

38BR162. This site is a scatter of prehistoric lithic material of an unknown period and an Historic period occupation. The site is on a hillslope and is northeast of an unnamed tributary of Boggy Gut Creek. It slopes to the east and is situated at an elevation of 330 feet. The site is partially disturbed by road work.

38BR163. This site is a small scatter consisting of only two chert flakes. Due to the nature of the artifactual material, the site is presently undatable. The site is on a hillslope and is northeast of an unnamed tributary of Boggy Gut Creek. It slopes to the west and is at an elevation of 330 feet.

38BR164. This site consists of one chert biface and is therefore undatable. Although the area was searched intensively, no other artifactual material was located. The site is on a hillslope and is northwest of an unnamed tributary of Boggy Gut Creek. It slopes southwest and is located at an elevation of 270 feet.

38BR165. This site is a small scatter of chert flakes measuring about 20 by 7 m. Lack of diagnostic material prevents the placement of this site in a cultural time period. The site is on a hillslope and is northwest of an unnamed tributary of Boggy Gut Creek. It slopes southwest and is situated at an elevation of 250 feet. The site is in a dirt road cut and has therefore been partially disturbed by grading and other related activities.

38BR166. Surface collections from this site yielded only one chert biface and since there were no diagnostic artifacts associated with the biface, no date may be given for this site. The site is on a terrace east of Steel Creek. The slope aspect is direct and is at an elevation of 140 feet.

38BR167. Artifactual material from this site consists of five chert flakes. As there were no diagnostic artifacts recovered, the date of the site is unknown. The site is on a terrace and is east of Steel Creek. The slope aspect is direct and is situated at an elevation of 140 feet. The site has been partially disturbed by grading and erosion.

38BR168. This site is a small scatter of lithic material consisting of seven chert flakes and one chert biface. Since no diagnostic material was found, the date of the site is presently unknown. The site is on a terrace and is east of Steel Creek. It is at an elevation of 140 feet and slopes to the southwest. The site has been disturbed by road grading and erosion and is partially torn up from logging activities.

38BR169. Artifactual material at this site consists of five chert flakes and some Historic period ceramics. The absence of any prehistoric diagnostic artifacts prevents the assignment of this site to a specific cultural time period or phase. The site is on a terrace and is east of Steel Creek. It slopes south and is at an elevation of 130 feet. There has been some logging in the area which is responsible for some of the disturbance at the site.

BR38170. This site (the Hound Dog Site) is extremely rich in artifactual material. The area was walked over carefully and 100% of all visible surface remains were collected. This included 494 chert flakes, bifaces and prehistoric pottery fragments. Cultural material was found over an area measuring about 100 by 25 m. It has been assigned to the Woodland and Mississippian periods due to the type of pottery present at the site. Although no Archaic artifacts were found, the site may have been occupied during Archaic times. The site is most probably a habitation site due ot the nature of artifactual material recovered. It is situated at an elevation of 130 feet and slopes south. It is east of Steel Creek and south of an unnamed tributary of Steel Creek on a terrace.

During the collection of this site, no sub-surface testing was implemented. It is partially disturbed by road grading and erosion, but the surrounding forested areas are most probably still well preserved. This site provides an excellent chance to study change through time if indeed it was occupied from Archaic times up until the Mississippian period. Areas that are still undisturbed may provide a much needed chronology for the area.

38BR171. This site is an isolated find consisting of one chert flake. It is therefore impossible to know to which cultural time period the site dates. The site is located on a hillslope north of an unnamed tributary of Boggy Gut Creek. It is at an elevation of 270 feet and slopes southwest. The site has been partially disturbed by road grading and resultant erosion.

38BR172. Surface collections from this site revealed only one chert flake and it is therefore impossible to assign this site to a cultural period. It is at an elevation of 190 feet and slopes west. Partial disturbance has occurred from road grading and erosion but this does not appear to have caused severe damage to the site.

38BR173. This site is a small lithic scatter measuring about 25m by 7m. It consists of nine chert flakes and the lack of diagnostic artifacts prevents assigning the site to a specific cultural period. The site is east of Steel Creek and is on a terrace. The slope aspect is direct and it is located at an elevation of 140 feet. The site has been partially disturbed by road grading, erosion and some logging activity but this does not appear to have caused major damage.

38BR174. Surface collections at this site revealed fourteen chert flakes and no associated diagnostic material. Because of this, no temporal stage may be assigned to this site. Artifactual material was found spread over an area about 15 m by 7 m. The site is on a sandy terrace east of Steel Creek. The slope aspect is direct and it is at an elevation of 140 feet. The site has been partially disturbed by road grading and some erosion. Surrounding areas appear to be less disturbed as they are wooded and may provide useful information on the site.

38BR175. This site was fairly rich in historic period material and ceramics are indicative of a pre-Civil war occupation. Material was found dispersed over an area measuring about 60 m by 90 m. Although no foundations or structural remains were observed, they may exist buried beneath the surface. The site is on a sandy terrace east of Steel Creek. It is situated at an elevation of 140 feet and slop aspect is direct.

38BR176. Surface collection at this stie yielded 465 chert flakes as well as bifaces, unifaces, points and preforms. The presence of Savannah River points at the site indicates a Late Archaic occupation; no prehistoric pottery was found although a good amount of Historic material was found including iron, ceramics and glass. Four test pits were excavated, revealing numerous chert flakes of bifacial retouch. No other diagnostic tools were recovered and the site is therefore thought to be representative of a Late Archaic occupation. The site is located on a sandy terrace east of Steel Creek. Slope aspect is direct and is at an elevation of 130 feet. The site has the potential to provide useful information on the Archaic and should not be destroyed without the proper attention.

38BR177. This site is a small prehistoric lithic scatter consisting of six chert flakes. Artifactual material was scattered over an area measuring about 15 m by 7 m. The site is on a swamp edge north of Steel Creek. Slope aspect is direct and situated at an elevation of 100 feet. No sub-surface testing was done when the site was located.

38BR178. This site was recognized by a standing chimney. No surface material was collected although there were brick fragments and broken glass scattered around the area. The site is on a swamp edge north of Steel Creek. Slope aspect is direct and is at an elevation of 130 feet. The date of the site is not known but it appears to be of the 19th century.

38BR179. This site is a prehistoric lithic scatter and Historic period site. Surface collections yielded numerous chert flakes, several bifaces and a tip of a Savannah River point as well as Historic period ceramics. The site is on a terrace adjacent to the Savannah River swamp and Pen Branch Creek. It slopes south and is situated at an elevation of 100 feet. Vegetation consists of oak, gum, pine, hickory and some cypress. All surface material was collected although no sub-surface testing was done. The site currently exists in a road cut and pine plantation and has therefore been partially displaced by road grading and bulldozing. Some clear-cutting has been done in the area and the site has also been disturbed by heavy machinery.

38BR180. This site is a prehistoric lithic scatter measuring about 12 by 10 m. Although some historic ceramics were found, no diagnostic prehistoric artifacts were found and therefore it is unknown to which prehistoric cultural period this site belongs. The site is on a Sunderland terrace west of Steel Creek. Slope aspect is direct and is situated at an elevation of 110 feet. The site is adjacent to a low lying area of the terrace with predominant stands of hardwoods (oak, gum and others).

38BR181. This site is a small prehistoric lithic scatter consisting of four chert flakes. As no diagnostic artifacts were found the date of the site is presently unknown. The site is on a swamp edge northeast of Steel Creek. Slope aspect is direct and is at an elevation of 130 feet. No subsurface testing has been done at this site. The site has already been partially disturbed by road grading and heavy machinery operating in the area. Clear cutting and logging have also caused some minor disturbances.

38BR182. Surface collections at this site yielded nine chert flakes and one chunk of chert. No diagnostic artifacts were recovered and for this reason, the date of the site is unknown. The site is on the Sunderland terrace west of Steel Creek. Slope aspect is direct and it is situated at an elevation of 110 feet. The site has been subjected to a small amount of road grading and erosion.

38BR183. This site is characterized as an isolated find; only one chert flake was recovered. The site is on the Sunderland terrace west of Steel Creek. Slope aspect is direct and is at an elevation of 120 feet. The site is in a roadcut and has therefore been subjected to some road grading and erosion.

38BR184. This site has an unknown prehistoric lithic component and an historic component. Only one chert flake of bifacial retouch was found and therefore it is not known to which prehistoric cultural period this site belongs.

of the site is not known. The site is on a terrace west of Steel Creek. Slope aspect is direct and is at an elevation of 115 feet.

38BR192. This site is a scatter of prehistoric lithic material and Historic period ceramics covering an area about 20 m by 20 m. Lack of diagnostic artifactual material prevents the placement of this site in a prehistoric cultural time period. The site is on a terrace point and is west of Steel Creek. It is situated at an elevation of 100 feet and slopes northwest. The presence of Historic period ceramics could be indicative of a structure although no evidence of this was seen on the surface.

38BR193. Artifactual material at this site consisted of chert flakes and one fragment of fire-cracked rock. As no diagnostic artifacts were found at this site, it is not known is which cultural period this site belongs. The site is on the Sunderland terrace and is west of Steel Creek. It is situated at an elevation of 100 feet and slope aspect is direct. The site has been subjected to minor road grading and some erosion but has not been severely affected.

38BR194. This site is an isolated find consisting of one chert chunk. Lack of any other artifactual material prevents the placement of this site in a cultural time period. The site is on a terrace and is located west of Steel Creek. It is situated at an elevation of 100 feet and slope aspect is direct.

38BR195. Surface collections from this site yielded only one chert flake and therefore the cultural period of this site is unknown. The site is on a terrace and is north of Pen Branch Creek. Slope aspect is direct and at an elevation of 100 feet.

38BR196. This site is an isolated find consisting of one chert flake. Lack of other associated material prevents the placement of this site in a cultural time period. The site is on a terrace and is north of Pen Branch. It is south facing and is at an elevation of 105 feet.

38BR197. Surface collections at this site yielded only one chert flake. Since there was no other artifactual material found with this chert flake, the time period to which this site belongs is unknown. The site is on a hillslope and is east of Lower Three Runs Creek. It is south facing and is at an elevation of 200 feet. Disturbance to this site is minor and has been caused by road grading and some erosion.

38BR198. The artifactual material recovered at this site consists of several chert flakes, two fragments of fire-cracked rock and one chert triangular point which is either of the Woodland or Mississippian period. The artifactual material was found scattered over an area about 80 m by seven in a dirt road cut. The site is on a floodplain and is east of Lower Three Runs Creek. It is south facing and is situated at an elevation of 170 feet. The site has been disturbed by road grading and logging activity.

The historic component at the site is represented by several historic period ceramic sherds and glass fragments. The site is on the Sunderland terrace west of Steel Creek. Slope aspect is direct and is at an elevation of 120 feet. The site was intensively searched for surface materials and 100% of surface material was collected. The presence of historic ceramics could be indicative of a buried house foundation.

38BR185. This site is a prehistoric lithic scatter covering an area about 75 m by 50 m. No diagnostic artifacts were found and the date of the site is therefore not known. The site is on a Sunderland terrace west of Steel Creek. Slope aspect is direct and at an elevation of 110 feet. The road along which the site is located has been subjected to grading and erosion but the site does not appear to have been badly damaged.

38BR186. This site is a small prehistoric lithic scatter consisting of eight chert flakes. The lack of diagnostic artifacts prevents the placement of this site in a cultural time period. The site is on a Sunderland terrace west of Steel Creek. Slope aspect is direct and the site is situated at an elevation of 120 feet. The site has been partially disturbed by road grading and erosion but does not appear to be in immediate danger of being totally destroyed.

38BR187. This site is a scatter of prehistoric lithic material covering an area about 40 m by 10 m. Lack of diagnostic artifacts prevents the assignment of this site to a specific cultural time period. Some historic ceramics were also found, indicating an Historic period occupation. No structures or foundations were observed on the surface and as no subsurface testing was done, it is impossible to say at the present time whether foundations exist beneath the surface. The site is on a terrace west of Steel Creek. Slope aspect is direct and is at an elevation of 115 feet.

38BR188. Surface collections from this site yielded four chert flakes. The absence of diagnostic artifacts prevents temporal placement of this site. The site is on a hillslope and is southwest of Lower Three Runs Creek. It slopes northeast and is at an elevation of 180 feet.

38BR189. This site dates to the Historic period as evidence by the presence of Historic period ceramics and other artifacts. Cultural material of this time period was found scattered over an area about 10 by 7 m. The site is on a hillslope and is southeast of Lower Three Runs Creek. Slope aspect is direct and is at an elevation of 200 feet. There is a possibility that structure foundations may lie buried beneath the surface. The site has been adversely affected by road grading, logging activities and some erosion.

38BR190. This site is characterized by a single chert flake resulting from bifacial retouch. As no other material was found with this artifact, the date of the site is unknown. The site is on a hillslope and is southwest of Meyer's Branch Creek. It is at an elevation of 245 feet and slope aspect is direct.

38BR191. This site is a scatter of prehistoric lithic material covering an area about 50 meters by 20 meters. It consists of 18 chert flakes and since no diagnostic artifacts were found in association with these flakes, the date

38BR199. This site is characterized by an isolated find consisting of one chunk of chert. No diagnostic artifacts were found and for this reason the date of the site is unknown. The site is on a hillslope and is east of Meyer's Branch. It slopes to the west and is at an elevation of 250 feet.

38BR200. This site consists of a scatter of chert flakes and two sherds of Historic period ceramics. The prehistoric time period to which this site belongs is not known because of the lack of diagnostic artifactual material. The site is on the swamp edge and is north of Pen Branch Creek. Slope aspect is direct and is at an elevation of 100 feet. The site has been partially affected by road grading and erosion.

38BR201. This site is a lithic and ceramic scatter covering an area of about 50 m by 50 m. Artifactual material is indicative of a Woodland occupation. Surface collections yielded chert flakes and one plain pottery sherd. The site is on a terrace fragment at the junction of Pen Branch and an unnamed tributary. It is situated at an elevation of 110 feet and faces southeast. Vegetation consists of pine and hardwood swamp. The site has been disturbed by logging, erosion and clear-cutting. When the site was located, surface collections were made and a post hole digger was used. Six post holes were dug to a depth of 1.0 to 1.5 meters. The site is being disturbed by various construction activities.

38BR202. Artifactual material at this site consists of chert flakes, historic ceramics and one prehistoric pottery sherd. This material is indicative of both Woodland and Historic period occupations. The site is on a sandy terrace remnant and is west of Pen Branch. It is situated at an elevation of 150 feet and is east facing. Vegetation at the site consists of pine with hardwoods to the south and east. No subsurface testing was done at the time the site was located.

38BR203. This site is a scatter of prehistoric chert flakes and historic period materials. No diagnostic prehistoric artifacts were located, therefore the time period to which the prehistoric materials belong is unknown. No historic foundations were noticed. The site is on the second terrace and is north of Pen Branch. It is at an elevation of 140 feet and is sloping east. The site has been disturbed by road work and logging activities.

38BR204. This site is a scatter of prehistoric chert flakes. The lack of diagnostic artifactual materials prevents the placement of this site in a prehistoric cultural period. The site is on a terrace on the east side of Four Mile Creek. It is facing west and is at an elevation of 120 feet. Partial destruction has occurred at the site due to the construction of a power line and dirt road cut.

38BR205. This site is a small scatter of lithic material covering an area about seven by ten m. No diagnostic artifacts were found and the site is therefore impossible to date. It is on a terrace west of Pen Branch and is adjacent to a small stream which is now dammed. The site is at an elevation of 130 feet and is facing southwest. Vegetation consists of pine and hardwoods.

38BR206. Artifactual material at this site consists of four chert flakes and Historic period ceramics. There are no prehistoric diagnostic artifacts so the date of the prehistoric material is not known. No historic structures were noticed but they may be covered by dense vegetation or buried beneath the surface. The site is on a terrace edge and is west of Pen Branch. It is at an elevation of 130 feet and is sloping southwest. The site has been partially disturbed by road work.

38BR207. This site is a scatter of Woodland period material as evidenced by the presence of Woodland pottery sherds. The material (pottery sherds and chert flakes) was found scattered over an area measuring about 150 m by 50 m. Intensive surface collections were made as well as the excavation of a small one by one m test pit. The site is on a terrace edge east of a small unnamed drainage. Pen Branch is located to the east of the site. It is at an elevation of 120 feet and slopes south. The site has been partially disturbed by road work and logging.

38BR208. This site is a scatter of Woodland and Historic period materials. Artifacts include chert flakes and bifaces, prehistoric pottery sherds and historic artifactual material. This material was found scattered over an area of 300 m by 50 m. The site is on a terrace and is west of Pen Branch Creek. It is at an elevation of 105 feet and slopes to the east. Vegetation consists of pine and hardwoods and is on the edge of an ecotone. The site has been adversely affected by the road cut in which it exists, logging and clear cutting. The continuation of these activities would be detrimental to the site.

38BR209. This site is a scatter of Woodland and Historic period cultural material. The Woodland period ceramics and Historic material were found scattered over an area of 30 m by 20 m. The site is on a terrace and is west of Pen Branch. It is at an elevation of 100 feet and slopes south. No subsurface testing was done at the time the site was located. The site has been partially disturbed by road work and other construction.

38BR210. This site is a scatter of prehistoric lithic material including chert flakes. The material was found scattered over an area measuring approximately 35 m by 15 m. The site is on a terrace and is about 100 meters west of Pen Branch. It is at an elevation of 105 feet and slopes southeast. The site has been partially affected by road construction and logging activities.

38BR211. This site is characterized by a single find which is a chert flake resulting from bifacial retouch. The lack of diagnostic artifactual material prevents the placement of this site in a prehistoric cultural period. The site is on a hillslope and between Par Pond tributary and Pond #3. It is situated at an elevation of 290 feet and slope aspect is direct.

38BR212. The site consists of an isolated find which is a single chert flake resulting from bifacial retouch. Lack of diagnostic artifacts prevents the placement of this site in a prehistoric cultural period. The site is on a hillslope and is located between Par Pond tributary and Pond #3. It is situated at an elevation of 290 feet and slope aspect is direct.

38BR213. The site is characterized by a single find which is a chert flake resulting from bifacial retouch. The absence of diagnostic artifactual material prevents the placement of this site in a prehistoric cultural time

period. The site is on a terrace between Pen Branch and Four Mile Creek. It is south facing and located at an elevation of 130 feet. The area in which the site is to be found is currently being used as pine plantation and a dirt road cut and there is a buried cable along the road. This has partially disturbed the site.

38BR214. Surface collections at this site yielded only one chert flake which is the result of bifacial retouch. The lack of diagnostic artifactual material prevents the placement of this site in a prehistoric cultural time period. The site is on a terrace between Pen Branch and Four Mile Creek. It is direct facing and is situated at an elevation of 140 feet.

38BR215. This site is characterized by a single find which is a chert flake, the result of a bifacial retouch. The lack of diagnostic cultural material prohibits the placement of this site in a known prehistoric cultural time period. The site is on a terrace and is between Pen Branch and Four Mile Creek. Slope aspect is direct and is at an elevation of 150 feet.

38BR216. This site is characterized by a scatter of prehistoric material and historic ceramics. The lack of any prehistoric diagnostic artifacts prevents the placement of this site in a specific prehistoric cultural time period. The site is on a hillslope east of Four Mile Creek. It is situated at an elevation of 120 feet and is facing northwest. The site has been partially disturbed by the road cut in which it exists, logging activity and associated heavy machinery and power line construction.

38BR217. This site is characterized by a single chert flake of bifacial retouch. As no diagnostic artifactual material was found with this chert flake, the site is presently not datable. The site is on a terrace west of Pen Branch Creek. It is south facing and at an elevation of 120 feet. The site has been partially disturbed by road grading and power line construction.

38BR218. Surface collections at this site yielded 21 chert flakes. Since no prehistoric diagnostic material was found in association with these flakes, the time period to which this site belongs is not known. The material was found scattered over a relatively large area measuring about 125 meters by 10 meters. Vegetation consists primarily of pine plantation. The site is on a terrace and is west of Pen Branch Creek. It is at an elevation of 105 feet and is facing southwest. The site has been adversely affected by road grading and some erosion but does not appear to be in danger of total destruction.

38BR219. This site is characterized by a scatter of prehistoric lithic material consisting of eight chert flakes. The absence of diagnostic material prevents the placement of this site in a prehistoric cultural time period. The site is on a hillslope and is north of a tributary of Reedy Branch and south of a tributary of Tinker Creek. Slope aspect is direct and the site is located at an elevation of 310 feet.

38BR220. Artifactual material found at this site consists of chert flakes and three prehistoric pottery sherds which date to the Woodland period. The site may be representative of other components. The site is located on a terrace and is northwest of Tinker Creek. It is situated at an elevation of 250 feet and is sloping southwest.

38BR221. This site is a prehistoric lithic scatter consisting of chert flakes. The lack of associated diagnostic artifacts prevents the placement of this site in a prehistoric cultural time period. The site is on a terrace and is south of the Savannah River swamp, midway between Four Mile Creek and Pen Branch. The site is at an elevation of 90 feet and slope aspect is direct.

38BR222. This site is a prehistoric lithic and ceramic scatter covering an area of about 250 m and 50 m. The artifactual material recovered consists of chert flakes, fire-cracked rock and pottery sherds. These cultural materials are indicative of a Woodland period occupation. The site is on a terrace edge and is east of Four Mile Creek. Slope aspect is direct and is at an elevation of 100 feet.

The area in which the site exists is currently forested and a dirt road roads through the site. This has caused disturbance to the site but most of it appears to be relatively well preserved. The site has excellent research potential as it is most likely a Woodland base camp.

38BR223. This site is a scatter of prehistoric chert flakes covering an area of about 40 m by 20 m. The absence of diagnostic artifacts prevents the placement of this site in a known cultural time period. The site is on a terrace and is east of Four Mile Creek. It is at an elevation of 100 feet and slope aspect is direct.

38BR224. This site is a small scatter of prehistoric lithic material. Surface collections at this site yielded six chert flakes. As no other cultural material was found in association with these flakes, the date of the site is not known. The site is on a terrace and is east of Four Mile Creek. Slope aspect is direct and is situated at an elevation of 100 feet.

38BR225. (The Canvasback Site). This site provided a large amount of artifactual material which was found through the use of a post hole digger and one test pit measuring one by one m. There was no surface material, but because of its location, the site was tested. Five post holes were dug, yielding chert flakes and prehistoric ceramics. The test pit provided the most artifactual material which included pottery sherds, chert flakes, and a biface. The site is believed to be representative of Archaic and Woodland period occupations.

The site is on a terrace point where Steel Creek joins the Savannah River. It is at an elevation of 115 feet and is south facing. The site has been partially disturbed by road work. The site offers excellent potential in that it is representative of Archaic and Woodland period base camps.

38BR226. This site is a small scatter of prehistoric chert flakes of an unknown time period. It is on a terrace-bluff on the south side of Tinker Creek. It is at an elevation of 230 feet and is sloping northwest. Vegetation is hardwoods and pine plantation.

38BR227. This site is characterized by a light scatter of prehistoric lithic and ceramic materials. Ceramic types are indicative of a Woodland occupation and it is unknown whether the site was occupied at earlier or later times. The site is on a hillslope and is west of Mill Creek. It is situated at an elevation of 300 feet and is facing north.

38BR228. This site is a scatter of both prehistoric lithic and ceramic materials. The nature of the artifactual material is indicative of a Woodland period occupation. The site is on a ridgeslope and is northeast of Par Pond. It is at an elevation of 260 feet and is sloping southwest. The site has been partially affected by road work and logging activities. The site is most probably a Woodland base camp and may be representative of an earlier or later occupation as well.

38BR229. This site is an isolated find consisting of one chert flake. Because there were no diagnostic artifacts found in association with this flake, the date of the site is not known. The site is on a ridgeslope and is east of a tributary of Par Pond. It is south facing and is at an elevation of 290 feet.

38BR230. This site is a light scatter of prehistoric chert flakes covering an area about 100 m by 7 m. The lack of diagnostic artifactual material prevents the placement of this site in a prehistoric cultural time period. The site is on a hillslope and is east of Mill Creek tributary. It is at an elevation of 300 feet and is sloping southwest. The site has been partially disturbed by power line construction and road grading. There also appears to have been some logging in the area which has caused damage as a result of heavy equipment in the area.

38BR231. This site is a scatter of prehistoric lithic and ceramic material which was found over an area approximately 75 m by 20 m. The site appears to be representative of a Woodland period occupation due to the recovery of a Woodland period projectile point and ceramic sherds. The site is on a hillslope and is east of Mill Creek. It slopes northeast and is at an elevation of 260 feet. The area has been subjected to disturbance as a result of power line construction, erosion, and heavy equipment.

38BR232. The site is a small lithic scatter consisting of two chert flakes. No diagnostic material was found at the site so the time period to which it belongs is not known. The site is on a hillslope and is north of a tributary of Mill Creek. It is situated at an elevation of 260 feet and slopes to the east. Vegetation is primarily pine plantation. The site has been adversely affected by power line construction and erosion.

38BR233. This site is a scatter of prehistoric lithic material and Historic period material. The lack of prehistoric diagnostic artifacts prevents the placement of this site in a known prehistoric cultural period. The site is on a ridgetop and is northeast of Par Pond. It is at an elevation of 270 feet and slope aspect is direct. Vegetation consists of pine and mixed hardwoods (oak and hickory). No historic foundations were seen on the surface, but there is a possibility that they have been buried.

38BR234. Artifactual material at this site consists of chert flakes with no associated diagnostic material. Because of this, the date of the site is unknown. The site is on a terrace and is one mile northeast of Steel Creek. It is at an elevation of 120 feet and faces southwest. Vegetation consists of primarily pine plantation. The site has been disturbed by erosion, logging, clear cutting and heavy machinery.

38BR235. This is an unknown prehistoric lithic site characterized by a scatter of chert flakes covering an area about 15 m by 20 m. The lack of diagnostic artifactual material prevents the assignment of this site to a specific cultural period. The site is on a point on a valley edge and is south of an unnamed tributary of Lower Three Runs Creek. The site is situated at an elevation of 200 feet and is facing northeast. Vegetation is primarily pine plantation. The site has been disturbed by the road cut.

38BR236. This site is characterized by a scatter of chert flakes and one chert biface. The material was found scattered over an area of about 25 m by 10 m. As no diagnostic cultural material was recovered during the surface collection made at this site, there is no way of knowing to which cultural period the site dates. The site is on a valley slope and is north of an unnamed tributary of Lower Three Runs Creek. It is situated at an elevation of 190 feet and is sloping south. The site is on a swamp edge with vegetation consisting of pine plantation and hardwoods. The site has been partially disturbed by road grading.

38BR237. This site is a large, dense prehistoric lithic and ceramic scatter which covers an area of about 300 m by 200 m. Artifactual material recovered at the site consists of fire-cracked rock, chert flakes, bifaces, three points, a chert core and prehistoric pottery sherds. This cultural material is indicative of Woodland period and Late Archaic period occupations. The site is on a valley slope on a swamp edge north of an unnamed tributary of Lower Three Runs Creek. It is at an elevation of 180 feet and is facing southeast. Vegetation consists of hardwoods and pine plantations.

The site is a dirt road with surrounding pine plantation and has been subjected to minor damage. A railroad runs through the site and has caused damage.

38BR238. This site is characterized by the presence of two chert flakes. The lack of diagnostic artifactual material prevents the placement of this site in a prehistoric cultural time period. The site is on a hillslope and is south of an unnamed tributary of Lower Three Runs Creek. It is at an elevation of 200 feet and is sloping northeast. The site has been damaged by the road cut in which it exists and by resultant erosion.

38BR239. This site is a scatter of prehistoric chert flakes which were found covering an area which measures about 90 m by 65 m. No diagnostic artifacts were found so the date of the site is not known. It is on a hillslope and is south of an unnamed tributary of Lower Three Runs Creek and west of Lower Three Runs Creek. The site is at an elevation of 180 feet and is sloping northeast.

38BR240. This site is a large scatter of prehistoric lithic and ceramic material and Historic period material. Artifactual material consists of fire-cracked rock, chert flakes, one point, 18 prehistoric pottery sherds and historic period material. This material was found scattered over an area measuring about 100 m by 85 m and is indicative of Woodland period and Historic period occupations. It may also be representative of a Mississippian period occupation. The site is on a ridge and is south of an unnamed tributary of Lower Three Runs Creek. The site is at an elevation of 220 feet and is sloping southwest. Vegetation consists of scrub oak and pine. The site has been badly disturbed by road work, erosion and borrow pit work.

38BR241. This site is characterized by a light scatter of prehistoric lithic material (chert flakes, one chert biface) and Historic period ceramics. Due to the lack of diagnostic prehistoric artifactual material, the cultural period of this site is unknown. The site appears to be an historic house site. It is on a sandy hilltop and is east of Par Pond and near an unnamed tributary of Lower Three Runs Creek. It is situated at an elevation of 260 feet and slope aspect is direct. Vegetation consists of pine plantation. The site has been damaged by the road cut in which it exists.

38BR242. This site is a small scatter of prehistoric chert flakes which were found in an area measuring about 10 m by 5 m. The lack of any prehistoric diagnostic artifacts prevents the placement of this site in a known prehistoric cultural period. The site is on a hillslope and is south of an unnamed tributary of Mill Creek. It is at an elevation of 260 feet and is sloping northeast.

38BR243. This site is a large lithic site covering an area of about 60 m by 100 m. The lack of diagnostic artifacts prevents the assignment of this site to a cultural time period. The site is on a terrace edge and is south of Steel Creek. It is at an elevation of 90 feet and is south facing. The site has been partially disturbed.

38BR244. This site is a small scatter of prehistoric lithic material which includes chert flakes and one point fragment. The point has been identified as being part of a Savannah River point which would indicate a Late Archaic occupation. The scatter covered an area of about 10 m by 15 m. The site is on a terrace and is west of Steel Creek. It is at an elevation of 120 feet and is facing southwest.

38BR245. This site is a small scatter of prehistoric lithic material which was found over an area of about 50 m by 10 m. The absence of any prehistoric diagnostic artifacts prevents the assignment of this site in a known cultural time period. The site is on a hill and is east of Pen Branch. It is at an elevation of 130 feet and slope aspect is direct.

38BR246. This site is a light scatter of prehistoric chert flakes found in an area of about 7 by 5 m. The lack of diagnostic artifactual material prevents the placement of this site in a known cultural time period. The site is on a valley slope and is on the south side of an unnamed tributary of Lower Three Runs Creek. It is situated at an elevation of 170 feet and is sloping northeast. The site has been damaged and badly disturbed by the road cut in which it exists.

38BR247. This site is a prehistoric lithic scatter of an unknown time period, which was found scattered over an area of about 75 m by 50 m. The site is on a terrace edge and is located south of an unnamed tributary of Lower Three Runs Creek. It is at an elevation of 180 feet and is north sloping. Vegetation consists of pine plantation and bottomland hardwood. The site is relatively undamaged.

Introduction

Results derived from laboratory analysis will be the subject of the following discussions. The intent of the analyses presented below is to provide an initial baseline descriptive synthesis of the primary data sets recovered during the reconnaissance of the Savannah River Plant. Three specific problems are addressed. First, the nature of intersite artifact variability is examined in order to suggest preliminary classes or types of sites which relate to individual site function. Second, the chronological association of the individual sites is assessed to allow for statements of occupational density during known prehistoric periods. Third, a review of settlement variability is provided, that controls for inferred site function within each occupational period. Based on these preliminary findings, suggested research orientations are offered which will provide a foundation for the eventual evaluation of the archeological significance of the cultural resources of the Savannah River Plant.

General Results

Prior to a detailed elaboration of the three problem areas, some basic findings will assist the reader in understanding the general properties of the reconnaissance results. A total of 309 discrete archeological sites was recorded during the three field seasons. As outlined in Table 4, these sites were primarily prehistoric with 288 sites having evidence of some form of prehistoric activity. Of the prehistoric sites, 221 were composed exclusively of aboriginal remains, while 67 had evidence of both prehistoric and historic occupation. An additional 21 sites were marked by the presence of strictly historic artifacts and/or structural remains bringing the total inventory of historic occupations to 88.

All of these sites were discovered using the opportunistic sampling strategy previously outlined above and, for the most part, were represented by limited collections of artifactual remains. In all but three cases the samples of material culture were obtained by controlled surface collections of all visible material. Due to difficulties involved during the collection of this data such as restricted visibility, the samples must be considered only as marginally representative of the individual site's content. However, the following analyses will attempt to derive some structure from the archeological record while bearing in mind the potential weaknesses of some of the inferences.

Most of the sites consist of small scatters of lithics and/or ceramics, permitting an investigation of activity distribution. Larger sites constitute a minority of the total sample, but provide sufficient artifact assemblages to permit reliable determinations of site content and probable function. The latter group of sites is predominantly located adjacent to larger streams on terraces or elevated floodplains,

TABLE 4

SUMMARY OF PREHISTORIC AND HISTORIC SITES RECORDED DURING INITIAL RECONNAISSANCE OF THE SAVANNAH RIVER PLANT TO 1977

	COUNTY TOTALS	CATEGORY TOTALS	CATEGORY PERCENTAGES
PREHISTORIC OCCUPATIONS ONLY			
Aiken County	84		
Barnwell County	137		
Total		221	71%
PREHISTORIC AND HISTORIC			
Aiken County	29		
Barnwell County	38		
Total		67	22%
HISTORIC OCCUPATIONS ONLY			
Aiken County	12		
Barnwell County	9		
Total		21	7%
TOTAL SITES RECORDED		309	

while the smaller sites tend to be randomly scattered across all general landform types. This general association is discussed at length below.

Inter-Site Artifact Variability

Considering the rather large size of the site inventory and the limited size of the majority of the individual site collections, the problem of determining variation between sites is conducted collectively. That is, rather than discussing each site at length, the entire prehistoric data set has been examined in aggregate to discern modal tendencies in site characteristics. Again, the specific goal of this analysis has been to put sites into groups of artifactual similarity that may be inferred to have functional conformity.

Of the 288 sites with prehistoric evidence, ten have been excluded because their collections were unavailable for analysis. These sites are 38AK56, 38BR8, 38BR9, 38BR13, 38BR14, 38BR15, 38BR16, 38BR17 and 38BR33. The absence of collections from these sites is indeed unfortunate since all of the sites are attributed to the Woodland and/or Mississippian periods on the survey forms. The remaining 278 sites were subjected to detailed analysis to determine the types and frequencies of artifacts persent.

Collections from these sites ranged from single artifacts to a maximum of 915 items. Only 74 sites contained identifiable lithic tools such as bifaces, projectile point-knives, unifaces, cores and cobble tools. Moreover only 14 of these sites yielded two or more tools. Thus, an analysis of site function based strictly on the diversity of stone tools would have culminated in a predictably limited assessment of site variation. A consideration of site diversity indices similar to those used by Fish (1976: 29-32) and House and Ballenger (1976: 96-100) resulted in the judgement that neither was appropriate to the present analysis because of the low tool frequencies and lack of tool type diversity indicated by the collections. A review of the tabulated artifact frequencies in Appendix B will substantiate this assessment.

Dominating the collection of artifacts were flakes of Coastal Plain chert. Numbering 10,246 altogether, this artifact class was composed of small flakes of bifacial retouch, primary decortication flakes, secondary decortication flakes and flake fragments. Chert flakes occurred at the overwhelming majority of prehistoric sites (n=246). Only in rare cases did non-chert debitage occur at sites; and in these cases, only single items were found. This apparent absence of nonlocal lithic raw material does not allow the use of an exotic raw material index as a measure of intersite variability. The reason for this lack of material variation is probably the highly isomorphic texture of Coastal Plain chert which makes it a most useful substance for the fabrication of all types of chipped tools. Furthermore, an outcropping of this material is known from Stoney Bluff Landing, Georgia directly across the Savannah River Plant. Within the confines of the plant, no outcroppings of siliceous lithic material were available so it is reasonable to propose that no lithic quarrying took place in the study area.

Prehistoric pottery sherds were present at 105 sites and numbered

1,056 pieces. The majority of these sherds were undecorated or eroded beyond recognition (n=634). This limited number of ceramics prohibited any analysis beyond a tabulation of surface decoration for purposes of chronological placement.

Given the general lack of apparent variability in the prehistoric record from the study area, only a limited number of analyses could be performed to discern less obvious sources of inter-site function. Although demonstrated to be quite useful in describing differences in Piedmont lithic assemblages of debitage, the use of the Coefficient of Variation on individual flake measurements (House and Ballenger 1976:94) was not attempted because of time constraints. In lieu of a more sophisticated analysis, a simple examination of overall artifact frequency per site was utilized.

If one can assume that the frequency of artifactual material at a site is an indication of the relative intensity of occupation (Schiffer 1976) and that the collections from the Savannah River Plant inventory are proportionally representative of the total artifact content of the site, then the artifact samples from each site can be considered as a measure of occupational or behavioral intensity. For example, sites which were used as habitation loci over a period of several months or years would be expected to have a relatively higher surface artifact frequency than a site used as a hunting or gathering camp for a period of a week or less. Although a combined frequency-site size measure resulting in artifact density would have been even more sensitive to such occupational intensity, accurate estimates of site extent were limited by the omnipresent ground cover and vegetation. Thus, for purposes of this study a simple examination of artifact quantity on a site by site basis will form the basis for preliminary functional assignments.

Instead of assigning a priori frequency limits on site classes which would assume some knowledge of rates of artifact deposition relative to occupational duration, an inductive strategy has been used. To determine modal tendencies in overall artifact occurrences per site, all 278 sites were tabulated by artifact frequency (Table 5). An inspection of this table permitted the division of the sites into three modes or classes. The first class comprising 63% of the sites is characterized by artifact frequencies of 10 or less. An intermediate class accounting for 20.8% of the site inventory is composed of sites containing between 11 and 50 artifacts. The smallest number of sites (16.2%) has artifact frequencies of more than 50 artifacts. Each of these artifact frequency classes is specified in Table 5.

Low Frequency Sites

Defined by the presence of 10 or fewer artifacts, this class is composed of 175 discrete archeological sites within the study area. While 37 of these can be controlled temporally by diagnostic artifacts, the vast majority contain only flakes of chert and other functionally indistinguishable debris. Following the assumption that intensity of occupation is positively associated with the quantity of artifactual material, this class of sites most likely represents very limited

TABLE 5

PREHISTORIC SITES BY TOTAL ARTIFACT FREQUENCY

Total Artifacts Per Site	Number of Sites	Percentage of Sites	
1	57	20.5%	Low Artifact Frequency Class (63.0%)
2	21	7.6%	
3	23	8.3%	
4	20	7.2%	
5	12	4.3%	
6	10	3.6%	
7	4	1.4%	
8	6	2.2%	
9	9	3.2%	
10	13	4.7%	
11-20	34	12.2%	Moderate Artifact Frequency Class (20.8%)
21-30	13	4.7%	
31-40	7	2.5%	
41-50	4	1.4%	
51-60	2	.7%	High Artifact Frequency Class (16.2%)
61-70	5	1.8%	
71-80	3	1.1%	
81-90	4	1.4%	
91-100	4	1.4%	
101-200	13	4.7%	
201-300	6	2.2%	
301-400	1	.4%	
401-500	2	.7%	
501-1000	5	1.8%	

utilization for a specialized set of activities. When viewed in terms of an overall settlement pattern, sites belonging to this class would be normally expected to constitute the majority of behavioral loci since they are associated with specific task group activities. Over the course of ten millennia the number of hunting and gathering episodes into the hinterland of a base camp or village could number into the thousands in an area the size of the Savannah River Plant. Therefore the common occurrence of these sites throughout the study area is predictable. Examination of these sites relative to environmental variability well be discussed following the description of the remaining two classes of sites.

Moderate Frequency Sites

This class contains 58 prehistoric sites which have artifact counts between 11 and 50 items. As a general mode in Table 5, these sites are less distinct than either the low or high modes, and probably represent an intermediate occupational intensity. Unlike the low frequency class of limited activity sites, the majority of sites (31) in the moderate class can be placed in the local chronology. The activities responsible for these sites probably differ from the lower class of sites only in intensity or number of participants. This relative increase in site content may also reflect a relationship to available resources (i.e. the increase in archeological material may result from more concentrated sources of food resources and attendant procurement activity). This proposed relationship could be expected to obtain in the distribution of moderate frequency sites. An investigation of this association will be represented in the summary on inter-site variability below.

High Frequency Sites

Forty-five sites are included in this class of high content loci. This group of sites has been defined by the modal tendency in artifact frequency exceeding 50 artifacts (Table 5). Chronological diagnostics are present at 72% of the sites in this class. Combined with a high inventory of flakes at these sites is a regular occurrence of lithic tools (64%) which suggests a highly intense utilization of the locations as opposed to the two lower content classes. Considering this information, this class may be provisionally assigned to a base camp or habitation functions which represent the most intense occupational occurrences within the study area. The distribution of such sites would be expected to be restricted to zones with diverse and predictably high resource availability. Further they would be expected to be located so as to maximize access to other zones. These expectations are discussed below.

Site Class Distributions

When examined in relation to the environment, the three site classes are predicted to generally pattern according to specific zones of resource productivity and diversity. Such resource zones can be derived from the ecological information provided earlier in this report and the

general association between soil, topographic position and vegetation community. For purposes of this analysis five resource zones are defined on the basis of known soil-landform associations; these zones are associated with vegetation communities; and finally, comparisons are made between these zones and the classes of prehistoric sites. Preceding the discussion of resource zone-site class patterns is a discussion of the classes in relation to two hydrological factors (distance to permanent water and rank of associated stream). Thus the following distributional study will investigate site class regularity according to availability of water, size of associated stream and resource zone.

In considering the expected pattern of archeological sites with respect to the availability of permanent water, two relationships can be predicted. First, sites representing long-term occupation exceeding a few days would be expected to be close to a potable water source for drinking and cooking purposes. Assuming that prehistoric populations attempted to minimize the distance between their habitation sites and a dependable water supply, then we can expect that high frequency sites in the study area should exhibit a trend toward low distances to permanent water. Second, sites representing more limited activities such as resource procurement (i.e. moderate and low frequency sites) would not be expected to exhibit a particular pattern with respect to potable water supply because the activities were of a brief duration and the distribution of all resources is not directly associated with streams. These small resource extraction sites could be related to any resource (deer, fish, acorns, hickory nuts, small game or wood) that is available throughout all areas of the upper Coastal Plain in differing relation to water. Therefore, we could predict a rather random pattern or lack of association between moderate to low frequency class sites and distance to water.

Table 6 contains a summary of site class - distance to water relationships which tends to meet the expected patterns of site location. The predicted pattern of high frequency sites (base camps and habitations) associated with potable water is indicated by the presence of 36 sites (57.8%) being less than 200 meters from permanent streams. The remaining sites, except for 2, are situated between 200 and 500 meters from water, bringing the total percentage of large sites within 500 meters to 96.4%. Such a strong association tends to support the proposition that long term occupation locations are selected with a consideration to local water supply.

The pattern existing between water supply and the low and moderate classes is somewhat stronger than predicted. Over 50% of the sites in each of these classes are located within 200 meters of water. As the tabulated information shows (Table 6) these sites are distributed much like the larger sites, with the only marked exceptions being the higher number of low-moderate sites beyond 500 meters from water. In conclusion the expected random pattern of limited activity sites is somewhat contradicted by the high association with water; however, relative to the base camp-habitation sites the limited activity loci are more dispersed. This could reflect the lack of direct consideration of water in selecting limited activity site locations.

TABLE 6

PREHISTORIC SITES BY ARTIFACT FREQUENCY CLASSES AND DISTANCE TO NEAREST PERMANENT WATER[a]

Artifact Frequency Class	DISTANCE TO NEAREST PERMANENT WATER (IN METERS)						
	Less than 100	101 to 200	201 to 300	301 to 400	401 to 500	More than 500	Totals
High	16 (35.6%)	10 (22.2%)	7 (15.6%)	9 (20.0%)	1 (2.2%)	2 (4.4%)	45
Moderate	19 (32.8%)	15 (25.9%)	7 (12.1%)	3 (5.2%)	4 (6.9%)	10 (21.1%)	85
Low	40 (22.9%)	47 (26.9%)	30 (17.1%)	15 (8.6%)	7 (4.0%)	37 (21.1%)	175
Totals	65	72	44	27	12	49	278

a- Row percentages in parentheses.

The second environmental variable considered in this analysis of site class distribution is stream rank, a measure of relative stream size and water content. Under the predicted site distribution pattern discussed for the site classes, base camps (high frequency sites) could be expected to associate more with high ranking streams since these would provide a regular source of water and would have higher productivity in terms of resources located in their floodplains. If moderate frequency sites are indeed representative of intense resource procurement and low frequency sites represent limited resource procurement, the expected pattern of distribution with respect to stream rank would be distinct. Low frequency sites would be concentrated away from major streams near rank 1 and 2 streams because these areas would contain lower density resources, while moderate frequency sites would be associated more with larger streams since these areas contain higher resource concentrations.

The results of the analysis of stream rank-site class associations are presented in Table 7. Inspection of the table indicates only a general tendency toward the predicted distributions. Low frequency sites are associated with small streams (ranks 1 and 2) in 63.4% of the cases with 43.1% and 44.4% of the moderate and high class sites, respectively, having small stream associations. Overall there is not a clear pattern of site class-stream rank association. This deviation from the expected pattern could be due to the consideration of variables other than stream size in the location of different classes of activity loci. Such a variable may be the resource availability of environmental zones rather than simply stream size or availability of water.

TABLE 7

PREHISTORIC SITES BY ARTIFACT FREQUENCY CLASSES AND STREAM RANK[a]

Artifact Frequency Class	Stream Rank 1	2	3	4	5	Totals
High	15 (33.3%)	5 (11.1%)	5 (11.1%)	16 (35.6%)	4 (8.9%)	45
Moderate	17 (29.3%)	8 (13.8%)	11 (19.0%)	14 (24.1%)	8 (13.8%)	58
Low	82 (46.9%)	29 (16.6%)	23 (13.1%)	28 (16.0%)	13 (7.4%)	175
Totals	114	42	39	58	25	278

a- Row percentages in parentheses

In an attempt to characterize the environmental variability in a resource related manner, a consideration of soil, landform and vegetation community is presented. On the basis of Aydelott's soil study of the Savannah River Plant (n.d.) and the discussion of vegetation communities by Beavers, et al. (1973) a composite picture of resource zones was developed. Five environmental zones were defined consisting of Uplands, Dry Terraces, Flooded Terraces, and Floodplains.

The Upland Zone is characterized by extremely well-drained soils belonging to seven defined types [Americus (1), Dotham-Norfolk (4), Fuquay-Wagram (5), Orangeburg-Red Bay (11), Troup (12), Lucy-Wagram (15) and Gunter (17)] (see Table 1). Associated with these soils most regularly is the xeric vegetation community dominated by pines and small oaks. The relatively dry conditions extant in this zone result in low resource productivity with the exception of seasonal peaks in acorn and deer frequency in the fall of each year. Small game is present in this zone in relatively low frequencies (Table 2).

Another zone associated with the xeric plant community is the Slope Zone. It is characterized by two soil types [Vaucluse-Blaney (2) and Lakeland-Kershaw (10)], which are very well drained (see Table 1). This zone generally has the same resource potential as the Upland Zone but differs in a somewhat higher hardwood density and deer population.

The Floodplain Zone is represented by four soil types [Grady-Bayboro (6), Johnston-Okenee (7), Johnston-Terra Ceia (7M), and the the mixed class (20)] (see Table 1). The mixed class of soils (20) consists of eroded and displaced Upland and Slope soil groups which have filled into the floodplains and valleys of streams throughout the Aiken Plateau and Brandywine Terrace physiographic areas of the plant. Two vegetation communities occur in the Floodplain Zone: the small stream hydric and large stream hydric. This zone can therefore be characterized by hardwood species and high faunal densities. Overall this zone is one of high resource potential.

Two terrace zones are defined on the basis of soils. The Dry Terrace Zone exists on the Sunderland Terrace and lower Brandywine Terrace regions of the study area near the Savannah River Swamp. Four soils identify this zone [Kalmia-Johns (9), Orangeburg, terrace phase (11T), Troup, terrace phase (12T) and Izagora (19)] (see Table 1). A mesic vegetation community correlates well with these soils and tends to be extremely productive as evidenced by the presence of extensive farming in this area prior to the establishment of the plant. Being elevated above the normal high water level in the Savannah River Swamp this zone is not subject to regular disturbance by flood waters. Fauna present in this zone include all major species in moderate to high frequencies.

Flooded Terrace Zone characteristics include regular inundation by overbank flooding from the Savannah River Swamp, well drained soils and mesic plant associations. Soil types indicative of this zone are Mascotte (3), Ocilla-Albany (8), Leaf-Wahee (13) and Osier (18) (see Table 1). Although differing from the Dry Terrace Zone only with respect to the seasonal flooding, the Flooded Terraces would not be a

suitable location for sites location because of the wet conditions. Resources within this zone would be very high and similar to the Dry Terrace zone.

Another zone not considered in this analysis is the Savannah River Swamp. Although this rich environment between the Savannah River and the Sunderland Terrace would have been a significant resource producer, it is not considered directly because no survey activities were conducted in its confines since it was flooded.

In summary of the five soil-landform zones, the zones are easily discernible on the basis of soil types. Resource potential varies according to the zones and, for this reason site class expectations can be derived. In terms of resource potential two groups of zones emerge: a high resource potential group consisting of the Floodplain, Flooded Terrace and Dry Terrace Zones, and a low resource potential group consisting of the Upland and Slope Zones. These two groups are formed on the basis of total yearly food resource production available for human consumption and are, therefore expected to have direct bearing on the location of sites of differing function of occupational intensity.

The comparison of site class distributions relative to the third environmental variable, landform-soil zone, should provide a more meaningful assessment of the expected site patterns. Since this variable provides an overall measure of relative resource density it is possible to predict certain general relationships that should obtain between the three classes of archeological sites and the resource zones.

High frequency sites representing intensive land use at a specific location over a period of time would be expected to be strongly associated with zones of high resource potential. This expectation is based on a satisficing principle which states that subsistence procurement behavior will attempt to minimize effort in the process of obtaining necessary food resources (Jochim 1976:6). Under this principle the most likely location for the majority human activity during a yearly cycle would be within the zone(s) which produces the greatest amount of food during most months of the year. By locating in such places the expense of resource acquisition would be minimized because of the reduced travel time. By comparison, limited activity sites representing less intensive land use (i.e. moderate and low frequency classes) would be expected in zones of lesser resource potential. Such sites would be most probably seasonal and result from the exploitation of specific resources. Other limited activity sites could be expected within high resource zones for a similar reason. Thus, a pattern of site distribution can be expected to exist which consists of low and moderate frequency sites being located in all resource zones with some concentration in the Upland and Slope Zones and of high frequency sites being situated only in areas of high yearly resource potential. Table 8 presents the general results of this distributional analysis according to the five environmental zones.

The distribution of low artifact frequency sites tends to concur with the expected situation in that sites of this class are found in all five environmental zones. Highest site densities (39.4%) occur in

the Upland Zone which can be associated with seasonal limited food procurement. An additional 16.6% of these small sites are situated in the Slope Zone and are probably associated with the same activities as in the Uplands. Together the Uplands and Slopes account for 56% of all low frequency sites in the study area. These sites also occur in high numbers in both the Dry Terrace and Floodplain Zones (28% and 14.9%, respectively) and to a lesser extent in the Flooded Terraces (1.1%). This total distribution reflects a pattern of land use indicative of selective resource procurement.

TABLE 8

PREHISTORIC SITES BY ARTIFACT FREQUENCY CLASSES AND ENVIRONMENTAL ZONES

Artifact Frequency Class	Environmental Zones: Uplands	Slopes	Dry Terrace	Flooded Terrace	Floodplain	Totals
High	6 (13.3%)	3 (6.7%)	20 (44.4%)	0	16 (35.6%)	45
Moderate	11 (19.0%)	4 (6.9%)	32 (55.2%)	1 (1.7%)	10 (17.2%)	58
Low	69 (39.4%)	29 (16.6%)	49 (28.0%)	2 (1.1%)	26 (14.9%)	175
Totals	86	36	101	3	56	278

Moderate artifact frequency sites indicate a general trend away from Upland and Slope utilization with only 25.9% of the total sample occurring in these low resource potential zones. An association of these sites with high resource zones was unexpected by the general model of site function and settlement, but this variation from the predicted settlement patterns is revealing. It may indicate that most of these moderate frequency class loci are associated with richer environments and, and therefore, denser resource concentrations. To test whether the difference between the low and moderate class sites is significant, a chi square test was conducted using the two resource zone groups as the independent variable (Table 9). The results of this test indicate that the distribution of sites with respect to the two resource zone groups is non-random. From this we can conclude that the nearly even distribution of low frequency sites between the two zones is significantly different from the concentrated distribution of moderate frequency sites in high resource zones. Such a relationship allows the conclusion that a definite association exists between resource density and the artifact density of individual sites.

The settlement model would predict high frequency sites to occur almost exclusively in the three high resource zones (Floodplains, Dry Terraces and Flooded Terraces). An inspection of Table 8 shows that

80% of the sites in this class are indeed located in optimal resource areas. Most of these are situated along the Sunderland Terrace and the major tributaries which are the more productive areas in the study area. The comparison of this suggested base settlement class of sites with the two limited activity classes in Table 8 shows a proportionately greater use of high resource zones by the large sites. However, there is considerable overlap between the site classes.

TABLE 9

ASSOCIATION BETWEEN RESOURCE ZONES AND LOW AND MODERATE FREQUENCY SITES[a]

Artifact Frequency Class	Resource Zone Groups: High Potential	Low Potential	Totals
Moderate	43 (29.9)	15 (28.1)	58
Low	77 (90.1)	98 (84.9)	175
Totals	120	113	233

a- Expected frequencies in parentheses

Degrees of Freedom = 1
Chi Square = 15.28
Significance < .001

To test the difference in distribution between base and limited activity site groups a chi square test was conducted using the information provided in Table 10. For the purpose of contrasting the site classes the two low frequency site classes were combined. Environmental zones were combined to reflect high and low resource potential. The results of this test indicate a significant, non-random pattern. The observed differences in settlement location between base settlements and limited activity sites by resource zones can be considered to represent an overall pattern. Base settlements are primarily located in zones of high resource potential.

To summarize the results of the inter-site artifact variability portion of this study six conclusions are offered. First, three modal tendencies exist in the artifact frequencies from all prehistoric sites. Second, these modal patterns can be assumed to reflect differential activity intensity at a site with high frequencies being indicative of high site use (base settlements) and moderate to low frequencies indicative of lesser site use (limited activity sites). Third, the distribution of these site classes is somewhat patterned with respect

to proximity to permanent water with base settlements showing high association with nearby water supplies and limited activity sites indicating a lesser association with water supply. This association suggests that potable water was a major consideration in the location of long-term occupation sites. Fourth, no apparent patterning occurred between site classes and size (rank) of the nearest stream. Fifth, site classes show the greatest amount of correlation with environmental zones of differential food resource productivity. Limited activity sites tend to be associated more with high resource availability zones. Finally, base settlements (high frequency class) tend to be significantly associated in the same rich zones.

TABLE 10

ASSOCIATION BETWEEN RESOURCE ZONES AND GROUPED FREQUENCY SITES[a]

Artifact Frequency Class	Resource Zone Groups: High Potential	Low Potential	Totals
High	36 (25.3)	9 (23.6)	45
Moderate and Low (combined)	120 (130.7)	113 (102.3)	233
Totals	156	122	278

a- Expected frequencies in parentheses

Degrees of Freedom = 1
Chi Square = 15.55
Significance < .001

In conclusion, when sites are examined from an artifact frequency perspective, regardless of temporal affiliation, a basic pattern of settlement was apparent. This pattern generally follows a satisficing principle which predicts base settlements to be in high resource zones and limited activity sites to be distributed across all zones. With this basic covariation established, the chronological association of specific sites will be discussed, followed by a second settlement analysis controlling for time.

Occupational Chronology

Beyond an understanding of the overall distribution of prehistoric sites within the Savannah River is the question of chronological

variability in occupation. To discern variation in human presence within the study area, the artifacts from each site were examined for the existence of certain stylistic types having specific temporal ranges. A total of 103 sites (37%) of the 278 prehistoric sites contained such information. From these sites the evidence indicated 141 recognizable prehistoric occupations or components ranging from the Early Archaic period through the Mississippian period. An additional 10 sites contained diagnostic materials according to field notes and records, but the collections for these were unavailable for study. These are therefore excluded from this discussion. Historical occupations were indicated at 88 sites, but detailed analyses of these sites will not be conducted until the next phase of archeological investigation on the Savannah River Plant.

Specific assignment of sites to chronological units was accomplished by using 17 individual artifact categories known to vary according to an established temporal sequence (see Appendix C for these artifact classes). The basis for assigning these artifact classes to temporal units has been discussed at length in the archeological background section, but three sources of literature have been relied upon heavily (Stoltman 1974; Coe 1964; Bullen and Green 1970). These studies provide the synthetic treatments of chronology in the vicinity of the study area.

Paleo-Indian Period

Represented by the presence of fluted points such as the Clovis and Suwanee types, sites of this period would have been expected in the Savannah River Plant according to Michie's comprehensive study (1976). However, no evidence of this earliest of aboriginal occupations was recovered during the field reconnaissance. Lack of representation in the sample of sites is not surprising because of environmental conditions. The most likely location for such early sites would be the Sunderland Terrace near the major stream mouths (Michie 1977). Field observation along this terrace and discussion with previous residents of the plant area indicate that a pattern of regular flooding existed on this terrace prior to the construction of the Clark Hill Dam north of Augusta. Roadcuts and shovel tests on the terrace indicate alluvial deposits to a depth of more than 1 meter consisting primarily of sand. This alluvial deposit would most certainly have diminished the probabilities of locating any sites used during the Paleo-Indian period. For this reason we cannot discount the possibility of a very early occupation in the study area strictly on the basis of preliminary field observations.

Early and Middle Archaic Periods

Evidence from the Archaic period is the earliest discovered thusfar in field examination. Twenty occupational components were recognized for the Early and Middle Archaic at 18 sites. One site, 38AK224, contained materials assignable to Dalton, Palmer and Kirk phases in addition to Woodland and Mississippian periods. Most other sites from the Early and Middle Archaic were multicomponent but to a lesser extent. The following discussion will present each recognizable occupation

phase present in the study area.

Dalton occupations were identified by the presence of Hardaway-Dalton points described by Coe (1964:64-66). No directly associated remains such as lithic tools and debitage can be attributable to this period since all three Dalton sites contained materials from two or more occupations. Sites containing Dalton points are listed in Table 11. Under the criteria for site classes presented in the inter-site variability discussion, two of the sites are in the high frequency (base settlement) class, and one is in the moderate frequency (limited activity) class. Due to the confused multicomponent nature of all of these sites, only excavation will authoritatively identify the exact character of these occupations.

Palmer phase occupations are present at 7 of the sites in the inventory. These Early Archaic components were recognized by the presence of Palmer type points (Coe 1964:67-69), which are characteristically corner-notched, straight based, ground on the base and relatively small in size. As shown in Table 11, the majority (5) of the sites containing Palmer components belong to the high frequency (base settlement) class, with only two having low and moderate artifact content (limited activity). Only 38AK161 and 38BR44 are single component sites which complicates any clear understanding of the composition of Palmer lithic assemblages. As in the case of Dalton sites, the understanding of Palmer occupations beyond a basic distribution of point types will require controlled excavation.

Kirk phase occupations indicate the presence of late Early Archaic-early Middle Archaic use of the study area. The eight sites attributed to this temporal phase (Table 11) all contained points of the Kirk type (Coe 1964:69-70), which are large knives having either stemmed or corner-notched bases and long blades. Three of the 8 Kirk sites were single component occupations; each of these was a limited activity site of the moderate or low frequency classes. All high frequency sites (base settlements) were multicomponent and therefore difficult to understand in terms of any specific occupation. The fact that almost all of the Early Archaic sites were multicomponent suggests the desirable quality of such contexts for settlement.

Only two sites 38AK164 and 38BR47, show clear evidence of Middle Archaic occupation. The former site contains a single Stanly point, which is a stemmed, indented based point described by Coe (1964:35). The latter site contains a Morrow Mountain point, which is a triangular stemmed point common throughout the Piedmont (Coe 1964:37-38). Both of these sites are in the high frequency class (Table 11). This scant evidence of the Middle Archaic may be due to sampling error, but this does not seem likely given the recovery of sites from all other major time periods. We could conclude that Stanly and Morrow Mountain occupations of the upper Coastal Plain are less common than Kirk and earlier. It may also be the case that this intermediate Archaic period is represented by a continued Kirk stylistic pattern in the Coastal Plain, while the other Middle Archaic style classes are more indicative of a Piedmont Middle Archaic. At present neither of these conclusions can be evaluated given the lack of clear information. Anderson, et al. (n.d.) have offered some information from the Cal Smoak site, which indicates a well

TABLE 11

SITES WITH ARCHAIC COMPONENTS BY ARTIFACT FREQUENCY CLASSES*

DALTON			PALMER		
High	Moderate	Low	High	Moderate	Low
38AK224	38AK89	---	38AK139	38AK85	38BR161
			38AK140		
38BR240			38AK224		
			38BR42		
			38BR44*		

KIRK			STANLY & MORROW MOUNTAIN		
High	Moderate	Low	High	Moderate	Low
38AK63	38AK163*	38AK107*	38AK164	---	---
38AK224		38AK130	38AK130		
38BR40*		38BR95*			
38BR176					

LATE ARCHAIC		
High	Moderate	Low
38AK139	38AK94	38AK114*
38AK224		38AK118*
	38BR108*	
38BR31		
38BR176		
38BR237		
38BR240		

*- single component site

represented Morrow Mountain-Guilford occupation in the Coastal Plain, suggesting that these stylistic groups were indeed present. However, the distribution of them is not known.

Late Archaic Period

The Late Archaic period in the Savannah River drainage is probably the most well known of all present because of the interest in the development of fiber-tempered pottery generated by excavations at Stalling's Island (Claflin 1933; Bullen and Green 1970) and at Rabbit Mount (Stoltman 1974). Although 10 sites provide evidence of this period only one, 38BR31, contained recognizable fiber-tempered pottery. All other sites were characterized by Savannah River points, which are large, broad bladed, knives with concave bases (Claflin 1931). The three single component Late Archaic sites (38AK114, 38AK118, 38BR108) were all small, limited activity loci (Table 11), while all high frequency sites (base settlements) were multicomponent. This points to the same pattern of multiple use through time of certain locations which will be further developed below.

Initial expectations of the reconnaissance were that Late Archaic sites would be common in the study are; however, this was not the observed case. The absence of a thorough investigation of the Wicomico Terrace (Savannah River Swamp) may be the reason for the under-representation. Stoltman (1974) has suggested a high correlation of Late Archaic sites with major rivers for purposes of exploiting riverine molluscan species. Sites from Groton Plantation support this association (Stoltman 1974), pointing to the need for a systematic reconnaissance of the swamp area of the plant during seasons of low water level. It is quite possible that large Late Archaic base settlements similar to Stalling's Island and Rabbit Mount will be present.

Woodland Period

This time period is represented in the Savannah River Valley by sand tempered ceramics of differing decorative patterns, with the exception of complicated stamped and burnished surfaces. Differentiation of individual types of ceramics such as Deptford linear check stamp or Savannah fine cordmarked was not attempted in this study for two reasons: the sherds are mostly eroded and indistinct and the ceramic type distinctions, especially between types having similar surface decoration, are vague and unclear. Surface decoration as the single criterion for sorting sherds was used because it was the least ambiguous attribute available. Temper was sand in all except the fiber-tempered sherds at 38BR31. Therefore, rather than obscure the results of any analysis with type names of limited value, surface decoration is used to determine temporal variation within the ceramic bearing occupations.

The Early Woodland has been investigated thoroughly in the Savannah River drainage and elsewhere in South Carolina and Georgia with special attention to the problem of intial sand tempering in ceramics similar to Stalling's Island types (Phelps 1968; Depratter, Jeffries, and Pearson 1973; Hemmings 1970; Calmes 1968; Stoltman 1974). The types attributed to the Thom's Creek ware-group (South 1973) are the point of contention

in that punctate and stamped designs similar to the Stallings ware-group occur on sherds with sand temper. Whether these type represent overlapping temporal periods or distinct temporal units is beyond the scope of this study. Thom's Creek ceramics are herein considered to be represented by the punctate decorative motif (Appendix C).

Deptford ceramics also are considered to represent an Early Woodland time period (Milanich 1972; Stoltman 1974). These ceramics are usually decorated with linear check stamping and simple stamping and for this reason sites with ceramics of these decorative types are, also, classed as Early Woodland (Caldwell and Waring 1939). Other styles of surface treatment were used in this ware-group (see South 1973), but were not used as characteristic of Early Woodland because they are more common in later Woodland times (e.g. bold check stamping).

Using the criteria of punctate, simple stamped and linear check stamped surface decoration as relatively unambiguous diagnostics, 32 Early Woodland components were identified in the reconnaissance. A listing of these sites, sorted according to frequency class, is presented in Table 12. A total of 16 sites contained high artifact counts and were multicomponent, except for 38AK144. Moderate and low suggest "pure", although limited, occupations.

TABLE 12

SITES WITH EARLY WOODLAND COMPONENTS BY ARTIFACT FREQUENCY CLASS

High		Moderate		Low	
38AK34	38BR31	38AK35*	38BR32	38AK154*	38BR78*
38AK88	38BR41	38AK95*	38BR58*		38BR97*
38AK89	38BR55	38AK110*	38BR59*		38BR220*
38AK93		38AK149	38BR228		38BR227*
38AK105		38AK153			
38AK139		38AK166*			
38AK140		38AK223			
38AK141					
38AK142					
38AK143					
38AK144*					
38AK220					
38AK224					

*- single component site

The quantum increase in the number of Early Woodland sites over previous Archaic sites would tend to suggest an increased occupational density in the study area, especially considering the relatively short duration of the Early Woodland when compared to the five or six millennia of the Archaic.

Due to confusion between Middle Woodland and Late Woodland ceramic decorations, the two periods are examined together. Cordmarked and check stamped designs are most common to sherds of this general period (Stoltman 1974) in the Savannah River drainage. Fabric marked designs were rare at the excavated sites on Groton Plantation, suggesting a relative paucity of this design in the vicinity of the study area (Stoltman 1974). Using only the criterion of sand tempering present in all sherds from the study area, the ceramics could belong to South's (1973) Cape Fear ware-group; however Stoltman (1974:63) refers to many of the sand tempered sherds from Rabitt Mount and other Groton Plantation sites as belonging to the Wilmington Cordmarked type because of their similarity in all other respects except sherd tempering to Caldwell and Waring's (1939) description. Whatever description of ceramic variability is correct has limited relevance in this investigation since we are looking for general patterning in the archeological record and are not attempting gross "cultural" comparisons.

Middle and Late Woodland occupations are present at 51 different sites in the Savannah River Plant spanning all frequency classes. This number of sites points to a rather intense utilization of the upper Coastal Plain during the Woodland, as do the 24 high frequency sites (Table 13). This latter class of sites suggests a proliferation of large base settlements and associated intense land use during the Woodland which compares favorably with Stoltman's conclusions for the Groton Plantation sample (1974:240-241). Smaller sites are for the most part single component occupations indicating an overall increase in all activities (Table 13).

A third class of Woodland sites was defined by the presence of sand tempered plain and unidentified sherds and triangular points in the absence of other ceramic types. Although these could also be associated with the Mississippian occupation, it seems unlikely, since there were only five sites with diagnostic sherds of this period. In total, 23 sites contain these undiagnostic sherds and points (Table 14). Relatively few of these sites are in the high frequency class (3), while 20 are in the low and moderate frequency classes. Further, 19 of the latter sites are single component, suggesting activities directly associated with Woodland base settlements in time. Additional research in an attempt to discern a direct association between these sites and diagnostic Woodland sites would greatly assist any definitive study of the Woodland occupation of the upper Coastal Plain.

TABLE 13

SITES WITH MIDDLE AND LATE WOODLAND COMPONENTS BY ARTIFACT FREQUENCY CLASS

High		Moderate		Low	
38AK34	38BR31	38AK60*	38BR32	38AK36*	38BR35*
38AK63	38BR37*	38AK75*	38BR36*	38AK77*	38BR77*
38AK88	38BR41	38AK129*	38BR39*	38AK109*	38BR109*
38AK93	38BR42	38AK147*	38BR62*	38AK130*	
38AK102*	38BR43*	38AK149*	38BR209*	38AK148*	
38AK105	38BR55	38AK153	38BR228	38AK154*	
38AK119	38BR170*	38AK158*		38AK155*	
38AK140	38BR208*	38AK223		38AK156*	
38AK141	38BR222*	38AK228*		38AK171*	
38AK142	38BR231*				
38AK143					
38AK164					
38AK220					
38AK224					

*- single component site

TABLE 14

SITES WITH UNDIAGNOSTIC CERAMIC PERIOD OCCUPATIONS BY ARTIFACT FREQUENCY CLASSES

High	Moderate		Low	
38BR225*	38AK85	38BR45*	38AK57*	38BR66*
38BR237	38AK103*	38BR201*	38AK64*	38BR67*
38BR340	38AK106*	38BR207*	38AK67*	38BR70*
	38AK152*		38AK69*	38BR91*
			38AK78*	38BR96*
			38AK79*	38BR106*
				38BR198*

*- single component site

Mississippian

Distinguished by the occurrence of complicated stamped sherds similar to Savannah complicated stamped (Caldwell and McCann 1941), 5 sites were tentatively assigned to this period. This low recognizable presence of Mississippian occupations was somewhat unexpected because of the proximity of the Hollywood Mound site (DeBaillou 1965) and other sites of this period along the Savannah River below the Fall Line. As suggested by Stoltman (1974: 241-244) this period may have focused its activities on the floodplain of the Savannah River for purposes of intensive agricultural exploitation. If this were indeed the case then sampling error can be the explanation for the small number of Mississippian occupations discovered during fieldwork.

Sites from this period are listed in Table 15. Four of the occupations fall within the high artifact frequency class although all of these are multicomponent loci. The only other site is a low frequency site consisting of two sherds at an historic homesite. Given this data one must conclude that either the sites are not present in the study area, which is quite unlikely, or the sites are in the Savannah River Swamp along with possible Late Archaic settlements.

Undiagnostic Prehistoric Lithic Scatters

The residual class of sites comprises the majority of prehistoric activity loci within the study area. In effect these 175 sites are defined by the absence of any diagnostic artifact material and are, therefore, considered to be single component occupations. The absence of diagnostic data may point to a relatively low activity density at these sites. Two groups of undiagnostic lithic scatters were formed based on the presence or absence of lithic tools.

Lithic scatters with tools are listed by frequency class in Table 16. As would be expected on the basis of no diagnostic items the overwhelming majority of these sites are low and moderate in artifact frequency. Only 3 of the 23 lithic scatters with tools have artifact counts in excess of 50. Further, no distinction can be made within this group on the grounds of differing tool types since most of these sites contain only a single formalized tool.

Table 17 presents a listing of all lithic scatters without tools located in the reconnaissance. Low frequency sites constitute 80.2% (122) of the sample and many of these are very small sites with five or fewer flakes. Fifteen percent (23) of the scatters are in the moderate frequency class and only 7 (4.8%) of the sites contain high artifact counts. These small sites without diagnostic artifacts are probably representative of the many non-habitation activities which were associated with any adaptation. Possibly a detailed debitage analysis of all flakes from these and other sites will provide an estimation of the kinds of activities present in this large site inventory.

TABLE 15

SITES WITH MISSISSIPPIAN COMPONENTS BY
ARTIFACT FREQUENCY CLASSES

High	Low
38AK34	38AK87*
38AK119	
38AK220	
38AK224	

*- single component site

TABLE 16

UNDIAGNOSTIC PREHISTORIC LITHIC SCATTERS
CONTAINING LITHIC TOOLS BY
ARTIFACT FREQUENCY CLASSES

High		Moderate		Low	
38AK99	38BR112	38AK91	38BR61	38AK86	38BR49
	38BR179		38BR160	38AK100	38BR64
			38BR202	38AK108	38BR93
				38AK113	38BR164
				38AK115	38BR166
				38AK145	38BR168
				38AK159	38BR221
				38AK165	38BR236

TABLE 17

UNDIAGNOSTIC PREHISTORIC LITHIC SCATTERS WITHOUT TOOLS
BY ARTIFACT FREQUENCY CLASSES

High		Moderate		Low		
38AK112	38BR38	38AK98	38BR74	38AK61	38BR48	38BR169
38AK161	38BR105	38AK111	38BR99	38AK65	38BR54	38BR171
38AK162	38BR185	38AK126	38BR100	38AK66	38BR56	38BR172
	38BR243	38AK168	38BR107	38AK68	38BR60	38BR173
			38BR113	38AK76	38BR63	38BR177
			38BR162	38AK90	38BR65	38BR180
			38BR174	38AK92	38BR68	38BR181
			38BR187	38AK101	38BR69	38BR182
			38BR191	38AK104	38BR71	38BR183
			38BR193	38AK116	38BR72	38BR184
			38BR203	38AK117	38BR73	38BR186
			38BR204	38AK120	38BR75	38BR188
			38BR210	38AK121	38BR76	38BR190
			38BR216	38AK123	38BR79	38BR192
			38BR218	38AK124	38BR80	38BR194
			38BR223	38AK127	38BR81	38BR195
			38BR233	38AK128	38BR82	38BR196
			38BR234	38AK136	38BR83	38BR197
			38BR239	38AK137	38BR84	38BR199
				38AK138	38BR85	38BR200
				38AK146	38BR87	38BR205
				38AK150	38BR88	38BR206
				38AK151	38BR89	38BR211
				38AK157	38BR90	38BR212
				38AK160	38BR92	38BR213
				38AK167	38BR94	38BR214
				38AK169	38BR98	38BR215
				38AK170	38BR102	38BR217
				38AK221	38BR103	38BR219
				38AK212	38BR104	38BR224
				38AK213	38BR110	38BR226
				38AK214	38BR111	38BR229
				38AK215	38BR151	38BR230
				38AK216	38BR153	38BR232
				38AK218	38BR154	38BR235
				38AK221	38BR155	38BR238
				38AK225	38BR156	38BR241
				38AK226	38BR157	38BR242
				38AK227	38BR158	38BR245
					38BR163	38BR246
					38BR165	38BR247
					38BR167	

Summary of Prehistoric Chronology

One hundred-forty one occupational components were recognized in the sample of sites recovered during the survey. A summary table (Table 18) indicates a general pattern of increasing occupational intensity beginning in the Early Archaic and reaching a climax in the Woodland Period. At either extreme of the prehistoric temporal scale site occurrence is either absent in the case of Paleo-Indian or slight in the case of Mississippian. Both of these anomalies could readily be explained as resulting from sampling errors associated with alluviation and swampy conditions.

Within the known and well represented time periods, the occupational history of the Savannah River Plant follows the expected pattern from other studies in the region (Stoltman 1974; Ferguson and Widmer 1976). The trend in site frequency toward the Late Woodland would suggest an overall increase in the number of people occupying the study area and a concomitant increase in resource procurement.

The problem of a more refined local sequence of chronological control is important. Although abundant ceramic and lithic types are suggested to have chronological meaning, better descriptions of the classes are called for in conjunction with reliable dates. Until these two factors are controlled, the most reasonable path to follow in making judgements of chronological placement of sites is caution.

The sample of prehistoric sites recovered in this study suggests that the Savannah River Plant has within its boundaries a wealth of chronologically significant cultural resources that should be preserved. The presence of all major occupation periods at relatively undisturbed sites should be regarded in any future evaluation of cultural properties in the study area, since in order to understand any variability in human behavioral patterns a well documented chronology is essential.

Among the more important archeological sites located in the study are those containing evidence of multiple prehistoric occupations (Table 19). A diligent effort should be made to preserve these sites in any land use planning, because such sites have the potential to reveal important information concerning problems of culture change, artifact assemblage variability and prehistoric adaptations.

TABLE 18

PREHISTORIC COMPONENTS BY ARTIFACT FREQUENCY CLASS

Chronological Unit	Artifact Frequency Class	Number of Components
Dalton (3 sites)		
	High	2
	Moderate	1
	Low	0
Palmer (7 sites)		
	High	5
	Moderate	1
	Low	1
Kirk (8 sites)		
	High	4
	Moderate	1
	Low	3
Stanly (1 site)		
	High	1
	Moderate	0
	Low	0
Morrow Mountain (1 site)		
	High	1
	Moderate	0
	Low	0
Late Archaic (10 sites)		
	High	6
	Moderate	2
	Low	2
Early Woodland (32 sites)		
	High	16
	Moderate	11
	Low	5
Middle & Late Woodland (51 sites)		
	High	24
	Moderate	15
	Low	12
Mississippian (5 sites)		
	High	4
	Moderate	0
	Low	1
Undiagnostic Ceramic (23 sites)		
	High	3
	Moderate	7
	Low	13

TABLE 19

SITES WITH MULTIPLE OCCUPATION COMPONENTS

SITE NUMBER	EARLY-MIDDLE ARCHAIC	LATE ARCHAIC	EARLY WOODLAND	MIDDLE-LATE WOODLAND	? CERAMIC	MISSISSIPPIAN
38AK34			X	X		X
38AK63	X			X		
38AK85	X				X	
38AK88			X	X		
38AK89	X		X			
38AK93			X	X		
38AK94		X			X	
38AK105			X	X		
38AK119				X		X
38AK130	X			X		
38AK139	X	X	X			
38AK140	X		X	X		
38AK141			X	X		
38AK142			X	X		
38AK143			X	X		
38AK149			X	X		
38AK153			X	X		
38AK154			X	X		
38AK164	X			X		
38AK220			X	X		X
38AK223			X	X		
38AK224	X	X	X	X		X
38BR31		X	X	X		
38BR32			X	X		
38BR41			X	X		
38BR42	X			X		
38BR55			X	X		
38BR176	X	X				
38BR228			X	X		
38BR237		X			X	
38BR240	X				X	

Historic Period

Historic occupations within the project area were represented by ceramics, glass, metal, brick and other artifactual materials used by the European, Euro-American and Afro-American inhabitants of the upper Coastal Plain. Inspection of the Mouzon map of 1775 and the Barnwell District Map (Mills 1965) indicates the presence of these populations within the limits of the Savannah River Plant beginning in the late 18th century. Extensity of occupation occurred following the American Revolution with more settlement developing in the area of the Barnwell District (Meriwether 1940; Mills 1965). According to the maps and other primary reference information most of this 19th century land use was related to agricultural exploitation of the terrace and riverine areas of the upper Coastal Plain. This basic trend in land use was gradually expanded into the upland areas following the Civil War with an increase in small land holdings and attendant small scale farming. Two towns, Ellenton and Dunbarton, were established in the plant area during the first half of the nineteenth century and finally abandoned at the time the plant was constructed.

Archeological evidence of this rather intense Historic period occupation was recovered from 88 sites. Twenty-one of these were strictly Historic occupations, while the remaining 67 had prehistoric occupations. Although no intense examination of artifacts from historic sites was undertaken, the general content of most of them appears to span the 100 years from 1850 to 1950. Due to lack of investigation of Historic remains in the first phase of the reconnaissance, such study will be a major focus in the next phase of archeological research. For reference purposes a listing of all Historic sites is presented in Table 20.

Settlement Pattern Variability

Although the distributions of archeological sites within the sample have been biased by a sampling design which excluded the Savannah River Swamp from consideration, an attempt will be made in this section to describe the patterning present within the data set available. Information concerning inferred functional classes (artifact frequency classes) and chronological occupations is examined with respect to environmental zones. The patterns of site distribution should be considered as preliminary with the expectation that further research in the Savannah River Plant will alter any conclusions. However, given the rather large sample of sites some meaningful trends in settlement patterning are suggested.

Stoltman (1974) has offered a general model of settlement change in the Savannah River drainage beginning with the Late Archaic and continuing through the Mississippian period. This model is based on inferred changes in subsistence base and in population density. Although no direct causal variables are identified in the model, the general trends can be compared with the Savannah River Plant data.

TABLE 20

SITES WITH HISTORIC COMPONENTS

HISTORIC AND PREHISTORIC OCCUPATIONS		HISTORIC OCCUPATION ONLY	
38AK34	38BR9	38AK62	38BR19
38AK57	38BR13	38AK70	38BR57
38AK61	38BR35	38AK71	38BR101
38AK66	38BR39	38AK72	38BR150
38AK87	38BR41	38AK73	38BR152
38AK107	38BR43	38AK74	38BR159
38AK109	38BR44	38AK96	38BR175
38AK110	38BR47	38AK97	38BR178
38AK112	38BR48	38AK122	38BR189
38AK114	38BR54	38AK125	
38AK115	38BR60	38AK217	
38AK118	38BR62	38AK219	
38AK119	38BR78		
38AK120	38BR83		
38AK124	38BR92		
38AK126	38BR104		
38AK127	38BR112		
38AK139	38BR162		
38AK140	38BR169		
38AK141	38BR179		
38AK142	38BR184		
38AK143	38BR187		
38AK150	38BR200		
38AK158	38BR202		
38AK211	38BR203		
38AK214	38BR206		
38AK216	38BR208		
38AK224	38BR209		
	38BR210		
	38BR215		
	38BR216		
	38BR218		
	38BR223		
	38BR233		
	38BR240		
	38BR241		
	38BR244		
	38BR247		

In the model of settlement and land use change, Stoltman (1974:231-244) suggested four different adaptations associated with Late Archaic, Early Woodland, Middle and Late Woodland, and Mississippian. Since very little information from pre-Late Archaic times was found in the Groton Plantation, these periods were not discussed in the model.

Late Archaic populations are suggested to have been almost exclusively dependent on the Floodplain zone at Groton Plantation for food resources (Stoltman 1974). The high utilization of both molluscan and large mammalian species is demonstrated in the Rabbit Mount and Clear Mount middens, and the low use of the upland area (i.e. other than floodplain) is demonstrated by the low frequency of Stallings series ceramics (1.1%) (Stoltman 1974). This extreme concentration of sites and high occurrence of shell midden in the floodplain lead to a conclusion that Late Archaic people were specialized shellfish gatherers with mammalian species as supplemental food (Stoltman 1974).

A transitional subsistence strategy between floodplain resources and upland resources during the Early Woodland is inferred by Stoltman because of the even distribution of ceramic materials between the floodplain and non-floodplain areas at Groton Plantation. An increasing reliance on vegetal resources resulting from diminished shellfish availability is considered as a probable cause for this transition (Stoltman 1974:236-238).

Middle and Late Woodland ceramic distributions at Groton were predominately restricted to the upland, non-flooded areas with more Wilmington sherds in the uplands and Savannah cordmarked sherds in floodplain (Stoltman 1974:215). Since the occurrence of ceramics in non-floodplain contexts surprised Stoltman, he attributed the pattern to an inland slash and burn horticultural adaptation (Stoltman 1974: 240-241). Since no direct evidence for this subsistence pattern was recovered, it has to be regarded as speculation. However, some explanation for the presence of Woodland in the non-floodplain environments appears to be required given the distributions.

Intensive floodplain agriculture is inferred for Mississippian because of two factors: the distribution of Mississippian period ceramics on the floodplain and the belief that all sites of this period were agricultural (Stoltman 1974:241-244). The empirical distribution of ceramics is indeed indicative of some kind of change, but the inference of intensive floodplain agriculture is not well supported. A depopulation of the Groton area is further inferred because of the lower ceramic frequencies during the Late Mississippian; this is attributed to the nucleation of population at large ceremonial centers (Stoltman 1974:243).

In summary of the Groton model (Stoltman 1974), the general pattern of settlement changes from intensive floodplain occupation in the Late Archaic to intensive upland utilization in the Woodland and, finally, to an intensive, but short term, occupation of the floodplain during Mississippian times. Several problems requiring attention are present in this model. First, the analysis is based almost exclusively on the

frequency of ceramic evidence with little or no consideration of lithic information. It does not seem likely that pots would be taken on hunting excursions into the uplands especially if these were of a brief duration. Therefore, many sites similar to the undiagnostic lithic scatters found in the present study, which would not show ceramic affiliation would be expected. This point is especially important in the consideration of the Late Archaic and Mississippian since these periods are suggested to be exclusively floodplain adaptations. Second, the survey at Groton Plantation resulted in the collection of information on sites with ceramics with only a single exception. This fact would suggest a sampling bias toward certain types of sites, that was not oriented toward a overall characterization of the subsistence strategies of the study domain. Third, the use of upland as a designation for all non-floodplain environments does not consider the potential environmental variation in stream systems, ridges, and terraces of the Savannah River Swamp. An inspection of the map in the Groton report (Stoltman 1974:34) shows that 18 of the 19 "upland" sites are within ½ mile of either the swamp or a stream. This would indicate that the "upland" sites are primarily associated with either a terrace or small stream floodplain, and are not in an elevated position. From this and the other comments, it must be concluded that the model over-emphasizes the difference in environment and presents a questionable dichotomy of settlement patterning. The only definite difference is between the Late Archaic and Mississippian occupations on floodplain sand mounts and the Woodland occupations in non-floodplain environments adjacent to streams or swamps.

Although there are problems with Stoltman's model, it serves as one of the only treatments of settlement and subsistence in the literature on prehistoric Coastal Plain occupations. The following analysis will attempt to expand on the ideas expressed in the Groton Plantation model by considering site classes and environmental variability. Each temporal period is described in terms of these two variables and general patterns are discussed.

Early and Middle Archaic Settlement Distributions

For purposes of this analysis all occupations of these two periods are combined because of the overall similarity in subsistence strategies known for these periods throughout the eastern United States (Ford 1974). All indications are that are that Archaic populations of these periods were hunter-gatherers adapting to slowly changing Holocene environments. Twenty occupational components have evidence of this early period, thirteen of which are multicomponent sites.

Table 21 presence the association between frequency classes and environmental zones for Early and Middle Archaic occupations. The only definite pattern present in this cross tabulation is the abnormal concentration of high frequency class sites (base settlements) on the Dry Terrace and Floodplain Zones. Overall, the latter two zones contain 75% of the occupations of these Archaic periods suggesting a high use of the more hydric and mesic plant communities. The lack of many sites in Upland and Slope Zones could be due to either a

lack of activity in the zones or a lack of activity that resulted in the discard of diagnostic artifacts. At present either conclusion is possible.

TABLE 21

EARLY AND MIDDLE ARCHAIC COMPONENT DISTRIBUTIONS BY ENVIRONMENTAL ZONES[a]

Artifact Frequency Class	Environmental Zones: Uplands	Slopes	Dry Terrace	Flooded Terrace	Floodplain	Total
High	1 (7.7%)	1 (7.7%)	6 (46.2%)	0	5 (38.4%)	13
Moderate	0	0	3 (100%)	0	0	3
Low	2 (50.0%)	1 (25.0%)	0	0	1 (25.0%)	4
Total	3	2	9	0	6	20

a- Row Percentages in parentheses

Although the results must be viewed with caution because of the low sample size, the major conclusion of this analysis is that Early and Middle Archaic sites were located in those environmental zones which produced the highest food resources. The occurrence of 11 of 13 base settlements on terraces and floodplains of major streams suggests an opportunistic focus on optimum resource areas. All other occupations during this time period were spread across all but the flooded terrace zone.

Late Archaic Settlement Distributions

Bearing in mind the stated unavoidable sampling bias related to the Savannah River Swamp, little conclusive information can really be presented for the Late Archaic. The results which are offered are only for the observed occupations and are somewhat representative of the other environmental zones in the study area (Table 22). In total the ten occupations from this period are restricted to three zones. The three sites in the Dry Terrace Zone are all base settlements with high artifact frequencies. Two of the three sites in the Floodplain Zone are also base settlements. Only one occupation in the Upland Zone belongs to the base settlement class. Low and moderate class sites are limited in number (4) and are primarily in the Upland Zone.

TABLE 22

LATE ARCHAIC COMPONENT DISTRIBUTIONS BY ENVIRONMENTAL ZONES[a]

Artifact Frequency Class	Environmental Zones: Uplands	Slopes	Dry Terrace	Flooded Terrace	Floodplain	Totals
High	1 (16.5%)	0	3 (50.0%)	0	2 (33.5%)	6
Moderate	1 (50.0%)	0	0	0	1 (50.0%)	2
Low	2 (100%)	0	0	0	0	2
Total	4	0	3	0	3	10

a- Row percentages in parentheses

Even in the absence of any recorded sites in the swamp, their is a pattern of terrace and stream floodplain associated for larger Late Archaic sites. Of interest is the fact that all but one of these Late Archaic occupations are represented by Savannah River points and not fiber tempered pottery. Since this could mean that they represent either early (Stallings I) Late Archaic occupation or some kind of general Late Archaic subsistence practices outside of major floodplains, neither of these alternate descriptions can be evaluated authoritatively with the existing information.

Early Woodland Settlement Distributions

The high frequency of Early Woodland not only indicates a more intense occupation of the study area but allows for more in-depth analysis of settlement distributions. Table 23 shows the association between site classes and environmental zones for this period. The occurrence of small limited activity sites (low artifact frequency class) is restricted to the Upland and Slope Zones which have low resource potential relative to the other three zones. These settlements were most probably associated with resource procurement on a limited scale and were probably associated in time with larger sites in more favorable environments.

The moderate frequency class of sites, representing more intense resource procurement, is distributed in all but the Wet Terrace Zone. Only three occur in the Upland-Slope Zones, while the Dry Terrace and Floodplain Zones account for 6 and 2 components, respectively. This

follows the general pattern suggested in the site function section in that such sites are expected to be in higher resource zones as compared with smaller sites.

TABLE 23

EARLY WOODLAND COMPONENT DISTRIBUTIONS BY ENVIRONMENTAL ZONES[a]

Artifact Frequency Class	Environmental Zones: Uplands	Slopes	Dry Terrace	Flooded Terrace	Floodplain	Totals
High	0	0	9	0 (56.3%)	7 (43.7%)	16
Moderate	2 (18.2%)	1 (9.1%)	6 (54.5%)	0	2 (18.2%)	11
Low	4 (80.0%)	1 (20.0%)	0	0	0	5
Total	6	2	15	0	9	32

a- Row percentages in parentheses

Large base settlements constitute 50% of the Early Woodland sites and are restricted to the Dry Terrace and Floodplain Zones with 9 and 7 sites, respectively. This pattern of stream and terrace association is similar to that present at Groton Plantation (Stoltman 1974:34) although this was not recognized by Stoltman. Whether the reason for this concentration was related to initial horticulture or to hunting and gathering resource procurement cannot be addressed directly. However, since this pattern differs only slightly from the general Late Archaic we would speculate that Early Woodland subsistence was quite similar with respect to all resources except shellfish.

Middle and Late Woodland Settlement Distributions

Fifty one components associated with this time period are distributed across all zones (Table 24). Base settlements (n=24) are patterned similar to preceding periods with respect to the zones. Twelve are situated on Dry Terrace Zones and ten are located on Floodplains of streams. The other two occupations of large size are in the Upland and Slope Zones. Again, the densest behavioral intensity occurs in the zones producing the highest food resource yields.

TABLE 24

MIDDLE-LATE WOODLAND COMPONENT DISTRIBUTIONS BY ENVIRONMENTAL ZONES[a]

Artifact Frequency Class	Environmental Zones: Uplands	Slopes	Dry Terrace	Flooded Terrace	Floodplain	Totals
High	1 (4.2%)	1 (4.2%)	12 (50.0%)	0	10 (42.6%)	24
Moderate	3 (20.0%)	1 (6.7%)	8 (53.3%)	1 (6.7%)	2 (13.3%)	15
Low	3 (25.0%)	2 (16.7%)	4 (33.3%)	0	3 (25.0%)	12
Totals	7	4	24	1	15	51

a- Row percentages in parentheses

TABLE 25

UNDIAGNOSTIC CERAMIC COMPONENT DISTRIBUTIONS BY ENVIRONMENTAL ZONES[a]

Artifact Frequency Class	Environmental Zones: Uplands	Slopes	Dry Terrace	Flooded Terrace	Floodplain	Totals
High	1 (33.3%)	0	1 (33.3%)	0	1 (33.3%)	3
Moderate	0	1 (14.3%)	4 (57.1%)	0	2 (28.6%)	7
Low	7 (53.8%)	0	3 (23.1%)	0	3 (23.1%)	13
Totals	8	1	8	0	6	23

a- Row percentages in parentheses

Moderate frequency sites are also concentrated in the Dry Terrace and Floodplain zones with a single site occuring on a Flooded Terrace. Four of these sites are positioned in the Upland and Slope Zones but these represent only 26.7% of the sample of moderate frequency sites. Smaller sites of the low frequency class are distributed much like the moderate class, with proportionately more in the two high resource zones than expected under the satisficing model. This disparity can most likely be resolved by the addition of the undiagnostic ceramic sites to the Middle-Late Woodland group (Table 25).

The undiagnostic ceramic sites however show a similar pattern as the low and moderate frequency sites in the Middle-Late Woodland group. Looking only at the total components per environmental zone, a slightly higher number of sites occurs in Upland and Slope Zones, however the majority of sites are positioned in the terrace and stream floodplain zones.

In summary of the Woodland as a whole there exists little evidence for any massive change in settlement distribution. The outstanding variation results from an increase in sites attributable to the latter two phases of the Woodland. Subsistence practices, if reflected in settlement, appear to be basically the same throughout the period. One can only speculate about the presence of cultigens until excavations can be used to test the idea.

Mississippian Settlement Distributions

Given the lack of sites belonging to this late occupational period, the discussion is limited to the actual distribution of the sites. Four sites occur in the high resource group (terraces and floodplain) while only one is present in the low resource potential group (uplands and slope). Since we suspect sampling error with respect to this late time period, no inferences will be presented. The needed information on the topic of the Mississippian must await a survey of the Savannah River Swamp.

Undiagnostic Prehistoric Lithic Scatter Settlement Distributions

Sites without diagnostic artifacts are distributed throughout the study area (Table 26). The largest class of sites, the low frequency class, shows a pattern of even distribution between low resource areas (Upland and Slope Zones) and high resource areas (Flooded Terrace, Dry Terrace and Floodplain Zones) as do the other two frequency classes. The most general and interesting pattern is the very high number of sites in this class in the different environments.

Since no direct assignments of time can be made for any of these sites, they can be considered to relate to the general settlement patterns through the entire occupation. These anomalous sites are most probably the expected procurement loci which were part of every settlement-subsistence system in the project area and upper Coastal Plain, in general. They no doubt represent many different activities of varying duration which were conducted throughout the 9,000 years of

aboriginal habitation in this region. Only a close inspection of environmental variability beyond that presented in this report and a more thorough debitage analysis can aid in the resolution of this problematic class of sites. For although these appear to be outwardly insignificant due to small size and artifact content, they have the potential for broadening our knowledge of prehistoric subsistence and settlement patterning in the Savannah River drainage.

TABLE 26

UNDIAGNOSTIC PREHISTORIC LITHIC SCATTER DISTRIBUTIONS BY ENVIRONMENTAL ZONES

Artifact Frequency Class	Environmental Zones: Uplands	Slopes	Dry Terrace	Flooded Terrace	Floodplain	Totals
High	4 (40.0%)	2 (20.0%)	1 (10.0%)	0	3 (30.0%)	10
Moderate	8 (29.6%)	2 (7.4%)	13 (48.1%)	0	4 (14.8%)	27
Low	49 (35.5%)	22 (15.9%)	45 (32.6%)	2 (1.4%)	20 (14.5%)	138
Totals	61	26	59	2	27	175

a- Row percentages in parentheses

Summary of Settlement Pattern Variability

We have presented the basic distributions of settlement according to time units commonly recognized in the Savannah River Valley with attention to the model of upland-floodplain patterning suggested by Stoltman (1974). The general conclusion is that the latter model of subsistence-settlement change does not take into account the environmental variability that has been demonstrated to occur within the Savannah River drainage below the Fall Line. When finer grained zones of resource potential are considered the pattern of settlement becomes more varied indicating sensitivity to detailed variation in the environment.

The use of artifact frequency classes to apportion sites into inferred functional categories, although not the most sensitive of functional indices, has yielded groups of sites that vary regularly in space. Large base settlements characterized by high artifact frequencies have shown a high correlation with soils indicative of high resource potential. Regardless of time, these soil classes or environmental zones have been heavily utilized suggesting a strong covariation

between occupational intensity and environment. Moderate artifact frequencies characteristic of less dense activities of a limited nature have also shown a strong association with the high resource zones, and low frequency sites have been seen to lack any specific environmental correlation. The latter group of sites occurs regularly in the Upland-Slope Zones. This distribution is different from that of the other two classes of sites, but these small sites also occur in similar numbers in the Terraces and Floodplains.

Overall, the distributional characteristics of all occupational components are similar for each temporal period suggesting similar land use patterns. This conclusion must be qualified by the absence of a Savannah River Swamp sample which could greatly alter the pattern, most probably in the Late Archaic and Mississippian periods. Table 27 illustrates the regular association between all sites with confirmed chronological affiliation and the Dry Terrace and Floodplain Zones. One hundred and one of the total 141 occupations are located in these zones. By way of contrast the undiagnostic prehistoric lithic scatters are more evenly distributed with 86 of 175 sites occurring in these two zones (Table 27).

TABLE 27

SUMMARY OF OCCUPATIONAL COMPONENTS BY ENVIRONMENTAL ZONES

Occupation Period	Environmental Zones					
	Uplands	Slopes	Dry Terrace	Flooded Terrace	Floodplain	Totals
Mississippian	1	0	2	1	1	5
Middle-Late Woodland	7	4	24	1	15	51
Undiagnostic Ceramic	8	1	8	0	6	23
Early Woodland	6	2	15	0	9	32
Late Archaic	4	0	3	0	3	10
Early-Middle Archaic	3	2	8	0	7	20
Totals	29	9	60	2	41	141

Based on this and all other examinations of settlement distribution, the outstanding pattern relates more to environment than temporal period. The only key temporal change noticed in the analyses was the quantum increase of Woodland period sites. The occupational period accounts for 60.5% of all recognizable occupations and strongly suggests a greater occupational intensity during this time.

In contrast to the model proposed by Stoltman (1974), the results of this study indicate little change in settlement location indicative of subsistence changes. The association of large settlements with terraces and streams throughout the occupation of the study area provides strong evidence for a similar hunting and gathering subsistence base which could have been supplemented by horticulture in Woodland times without a major shift in settlement patterning. Smaller sites are located in a generally random pattern between the high and low potential resource areas suggesting hunting and gathering activities of a specialized nature throughout the study area. From these general conclusions future research should attempt to investigate inter-site variability across all site classes and environments in order to determine more sensitive indices of site function with respect to temporal units. The major questions to be investigated should include: "What is the nature of synchronic adaptation within each environment?" and "Why did they change?". These questions and others will form the basis for future research in the study and will eventually be among the criteria used for assessing the significance of cultural resources in the Savannah River Plant.

Archeological Considerations in Land Use Planning

Cultural resources have been determined to be of national importance since the passage of the Antiquities Act of 1906 (P.L. 59-209). Such resources are considered non-renewable, because they are, in many cases, the only record of cultural events that have transpired since the first occupation of North America. The legislative mandate for protection of cultural resources has been expanded since 1906 to require consideration of such places in all phases of federally funded land use. Of particular interest and importance to the future planning of land use on the Savannah River Plant are three pieces legislative and executive action: Executive Order 11593 of May 13, 1971 for the Protection and Enhancement of the Cultural Environment; The National Environmental Policy Act of 1969 (P.L. 91-190; 83 Stat. 852; 42 U.S.C. 4321-4327); and The Archeological and Historic Preservation Act of 1974 (P.L. 93-291; 88 Stat. 174; 16 U.S.C. 469).

Executive Order 11593 formed the basic need for the present inventory by requiring a survey of all federally controlled properties in order to locate and assess significant cultural resources. Draft guidelines for the conduct of such surveys were made public after the initiation of the present research but have been considered in this section (36 C.F.R. Part 64, Draft: Criteria and Procedures for the Identification of Historic Properties: Proposed Guidelines). Because the guidelines were released after initiation of this survey, and due to the high density of archeological resources recovered, only the preliminary phase of identification has been accomplished. Given these problems and the large area of the Savannah River Plant, recommendations for further inventory and significance assessments are proposed below. For purposes of E.O. 11593, the present study has identified basic patterning in settlement distributions which will serve as a predictive base for continued survey.

The National Environmental Policy Act of 1969 in conjunction with the National Historic Preservation Act of 1966 (P.L. 89-665; 80 Stat. 915; 16 U.S.C. 471) requires consideration and evaluation of archeological (cultural) resources in the planning of any federal project. This legislation requires project-specific reconnaissance and survey activity to assess the presence and significance of cultural resources in areas to be affected by the project. With reference to the Savannah River Plant, compliance with this mandate is presently being accomplished by the site coordination plan involving the SR-88 review process. Cultural resources are considered in early project planning stages. Thusfar no projects have involved any direct impact on known cultural resources, however recommendations for more intense inspection of proposed project locations are offered below.

The Archeological and Historic Preservation Act of 1974 (P.L. 93-291; 88 Stat. 174; 16 U.S.C. 469) applies to the recovery of archeological

and historical data in cases where destruction is certain. Although no cases of adverse impact have been determined for cultural resources on the Savannah River Plant, the likelihood of such effects in cases of land alteration will require intensive survey and evaluation of site significance. More detailed discussions of the above legislative and legal basis for cultural resource management are provided by King, et. al. (1977) and McGimsey and Davis (1977).

In order to complete the required inventory and assessment of significance for resources in the Savannah River Plant, continued reconnaissance and literature review will be required. Of particular concern for future research are the questions of historical occupation in the plant and of more detailed understanding of the prehistoric occupation. It is recommended that all future research be conducted within the Procedures for Requesting Determinations of Eligibility for Inclusion in the National Register (36 CFR Part 63) which were published in the Federal Register (April 27, 1976) and the aforementioned procedures for identification (36 CFR Part 64: Draft).

Results of the Present Study Pertinent to Land Use Planning on the S.R.P.

In addition to the specific results relating the sites on the Savannah River Plant to archeological interests, certain results have importance in future planning. These relate to the adequacy of the initial field reconnaissance for predicting site densities and the site locations.

As discussed in the methods section of this report, the sampling strategy used to locate sites was not based on probability theory but was instead an opportunistic sample. Figure 3 illustrates the dispersed coverage of the field examination throughout all areas of the plant, except those with restricted access whether due to security or physical constraints. To assess the dispersion of surveyed areas a comparison of the sample was made against the 4000 by 4000 foot patrol index grid (Fig. 4). Of the total 536 grid units having more than 50% of their area in the Savannah River Plant, 434 were inspected by the sampling design. The coverage was by no means complete, but it did manage to provide a good representation of all general environmental zones given the results presented in Table 8. Sites were found in 265 of the grid squares. Excluded from this summary are those areas of the plant adjacent to Lower Three Runs Creek south of patrol index Z-19, which were not examined.

To provide a general impression of the areas not inspected to any extent, a listing of the 102 patrol index units not sampled is given in Table 28. No future planning in these units can be done with the expectation that no cultural resources are present or predictable. The inspection of these unsampled areas will be a high priority consideration in the next phase of fieldwork. Those patrol index units not listed in Table 28 should not be considered as completely inventoried, rather they have received limited inspection in areas of reasonable visibility.

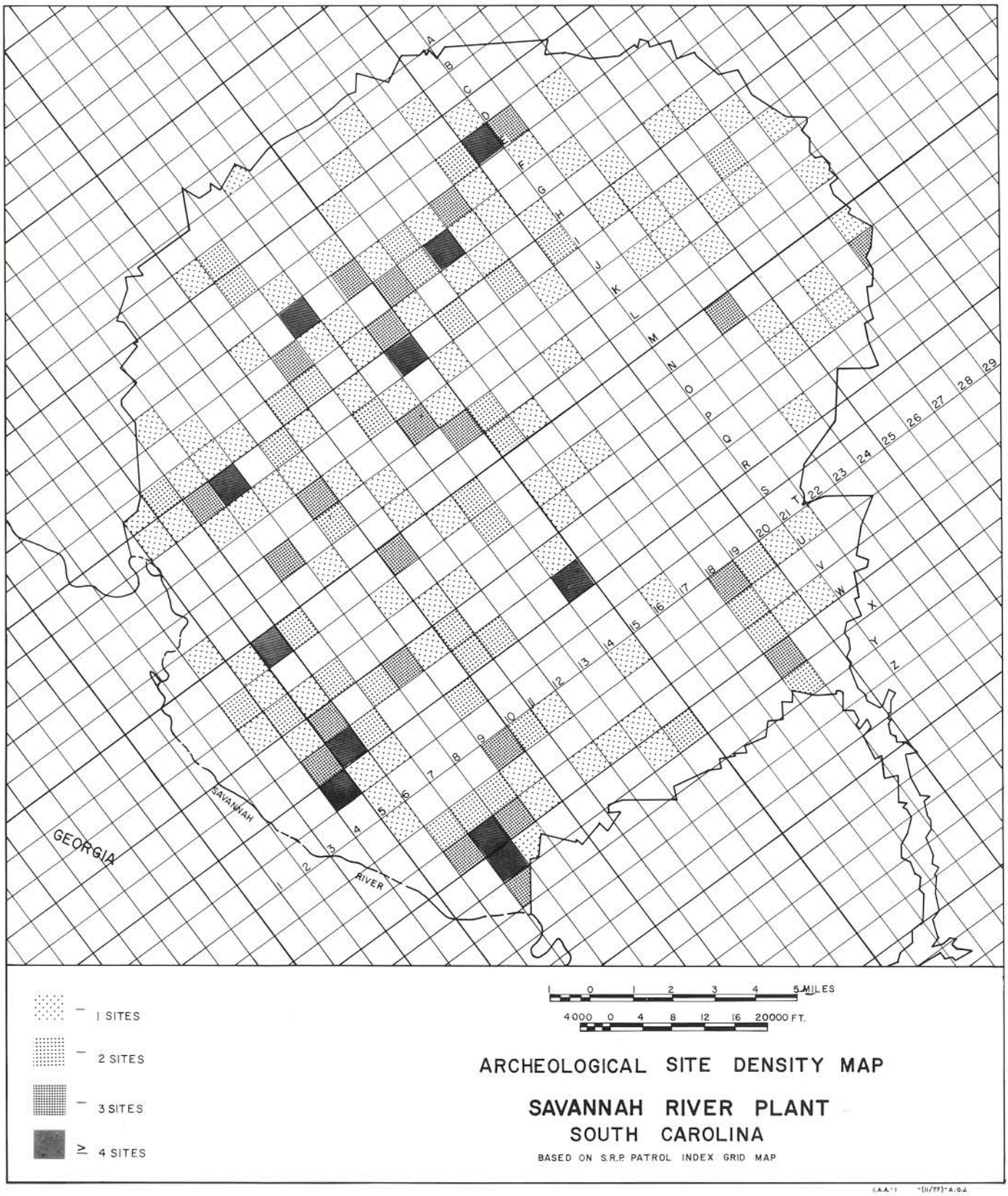
GEORGIA
SAVANNAH
RIVER
1 SITES
2 SITES
3 SITES
≥ 4 SITES
0 1 2 3 4 5 MILES
4000 0 4 8 12 16 20000 FT.
ARCHEOLOGICAL SITE DENSITY MAP
SAVANNAH RIVER PLANT
SOUTH CAROLINA
BASED ON S.R.P. PATROL INDEX GRID MAP

FIGURE 4.

TABLE 28

LSIT OF PATROL INDEX UNITS NOT SAMPLED DURING INITIAL RECONNAISSANCE[a]

A-11, A-12
B-18
C-8, C-23
D-12
E-15, E-24
F-20, F-25
G-5, G-6, G-14, G-27
H-12, H-19, H-21, H-24
I-8, I-11, I-13, I-15, I-17, I-21, I-24
J-4, J-5, J-14, J-16, J-17, J-20
K-4, K-5, K-21, K-24, K-27
L-3, L-4, L-5, L-16, L-19
M-2, M-4, M-12, M-13, M-23, M-24, M-26
N-1
O-1, O-14, O-23, O-27
P-1, P-2, P-7, P-20
Q-2, Q-3, Q-22
R-2, R-3, R-7, R-13, R-16, R-17, R-18, R-20, R-21, R-22
S-2, S-3, S-15, S-18, S-19, S-20, S-21
T-3, T-4, T-6, T-19, T-20
U-3, U-4
V-4, V-5, V-14, V-20, V-21, V-22
W-4, W-5, W-21
X-5, X-6, X-15, X-20
Y-5, Y-6, Y-12, Y-16

a - This list does not include the area along Lower Three Runs Creek downstream of Patrol Index Unit Z-19 which was not examined due to inaccessibility.

The second result of the preliminary fieldwork of importance to land use planning is the determination of actual distribution and density of sites within the plant. A site density map has been prepared to indicate concentrations of archeological resources (Fig. 4). This illustration indicates the relative densities of sites within the plant and should serve as a planning tool for all land use participants on the Savannah River Plant. High density and moderate density areas (e.g. patrol indices W-7, S-4, N-5, I-14, and E-14) should be avoided whenever possible in planning for major projects which would effect ground surfaces and therefore the archeological record. In those grids indicated to have no known sites, we cannot assume an absence of cultural resources, so planning will require SR-88 review even in these areas.

The overall utility of Figure 4 will be in areas where sites are located. In high and moderate density areas (greater than 1 site per unit), planning should involve the earliest possible inspection of the proposed project site, since there is a high probability of resources in such places. Low density units and those not listed in Table 28 in which no sites were recorded can be expected to have lower probabilities of site occurrence. If this information is combined with the soil type-site correlations established in Table 8, an educated plan for land use can begin to involve a consideration of archeological information.

In general, the results of the preliminary fieldwork and analysis point to three general areas of highest site probability. First, the Sunderland Terrace in the vicinity of the Savannah River Swamp has a very high density of archeological sites especially on Troup Sand (terrace phase) and Izagora soils. These areas should be avoided if at all possible in planning major land alteration projects. Second, the floodplains and terraces within one kilometer of the major streams of the study area have high site occurrences (i.e. Upper Three Runs, Pen Branch, Four Mile, Steel Creek and Lower Three Runs). These areas of predictably high archeological site presence should be avoided whenever possible by destructive projects. The third high density area, stream confluences, falls within the second area but deserves special attention. Certain sites which will most probably be recommended as eligible for nomination to the National Register of Historic Places occur at the confluence of tributaries and major streams and at the confluence of streams and the Savannah River Swamp. Protection of these high probability locations is recommended so as to preserve important cultural resources.

Areas of low site density have fortunately been the areas of greatest usage on the plant. The upland sand hills of the Aiken Plateau have a much lower density of sites than low lying regions. However any additional development of these areas should be made only within the procedures of the site coordination system (SR-88) to protect possible localities used by prehistoric and historic populations.

Potential Impacts on the Archeological Record of the Savannah River Plant

The nature of impacts on the archeological record has been discussed in great detail by King, et. al. (1977:57-63), and McGimsey and Davis (1977:30-31). This section will briefly discuss the kinds of activity which are known to occur within the study area having potentially adverse effects on cultural resources. The intent of this section is to aid planners by listing sources of possible conflict between their goals and those of cultural resource management.

Forest Management

This area of land use is the most widespread and common within the entire plant and has the greatest potential for impacting the archeological record. Since the origin of the Savannah River Plant forest management practices have involved the planting, thinning and harvesting of the timber resources of the federal land in the plant (Pitts 1976). Approximately 175,000 acres are managed by the United States Forest Service within the S.R.P.

Of concern in archeological resource management is the harvesting aspect of timber management since this activity has the highest potential for land modification. The use of heavy equipment in pulp and saw timber harvesting has been observed within the study area as have the related disturbances to the surface soils and sediments. Any displacement of soil for purposes of creating timber loading areas or access roads can greatly alter the context of archeological sites. Such activities would almost certainly result in severe impact to the archeological record without due consideration.

To avoid conflicts between archeological resource management and timber management, we recommend that all subsequent timber harvesting activities areas be intensively surveyed prior to any land disturbance. Such surveys could be conducted in the process of the projected plant-wide reconnaissance proposed for the next several years. If archeological sites which are determined to be significant by the State Historic Preservation Officer and the Advisory Council on Historic Preservation, are located within these areas, then a plan of avoidance could be recommended. However, if planning is accomplished in advance of such harvesting activities then the conflict can be avoided.

Construction and Maintenance

This general category of land use involves the other major type of direct adverse effect common on the Savannah River Plant. The need for improved facilities, new facilities, and maintenance of existing facilities has the potential for causing damage to the archeological record. The most common of these impacts occurs as a result of unpaved road maintenance. On numerous occasions sites were observed to have been greatly disturbed by the grading and ditching of the many dirt roads in the area, in fact this disturbance allowed for the recognition of many cultural resources

that would have been otherwise concealed by vegetation and sediment.

In those cases where grading is regularly conducted, we recommend intensive testing, especially in areas having known archeological sites. Such testing would allow for determinations of scientific significance of particular cultural resources so that a comprehensive mitigation plan could be formulated to protect important sites.

Other construction and maintenance activities such as building new facilities and new roadways should be considered on an individual basis well in advance of planned construction deadlines. Where such activities involve areas in excess of several acres, intensive survey beyond the initial SR-88 review and reconnaissance should be conducted to assess potential cultural resources in accordance with environmental protection and historical preservation regulations.

These two types of land uses have the greatest potential for direct impact on the archeological record of the S.R. P.

Managerial Effects

This class of indirect effect on cultural resources has been defined by King, et. al. (1977:58) as that resulting from "on-going management activities." Basically this involves the collection and excavation of archeological sites by personnel working within the plant and destruction of sites by indirect result of land use. The former case of site collecting has been known to be a problem since the initial fieldwork by Combes. Although most of this activity has been restricted to surface collection of lithic and ceramic artifacts and not subsurface disturbance by digging, it still has an adverse effect on the resources. Many of the large lithic scatters without diagnostic tools were probably intensively collected by workmen on the plant resulting in the permanent loss of important scientific data.

Since the activities of all employees on the plant cannot be regulated so as to prevent all of this destructive collection, we would recommend two things. First, all employees should be apprised of the existing law related to the disturbance of archeological sites on federal land (i.e. The Antiquities Act of 1906, P.L. 59-209; 16 U.S.C. 433). This notification should deter much of the adverse effect. Second, the regular patrols of the plant by DuPont security forces should be made so as to examine areas of high potential site density to discourage unauthorized excavations and collection. These two actions should greatly diminish the major indirect impact on archeological sites.

Another type of managerial impact could not be assessed. This consists of erosion and disturbance of sites by water action in streams receiving thermal discharges and on pond margins subject to wave action. Both of these effects should be considered in future field inspection.

Recommendations for Archeological Resource Management

Specific management recommendations have been presented in the preceding discussions, this final section will summarize these and offer general considerations for future archeological research on the Savannah River Plant for purposes of aiding the sponsor, United States Department of Energy, in complying with the existing regulations. The recommendations are presented in a numbered format.

1) Since documented assessments of significance have not been made for the sites in the Savannah River Plant, every effort should be made in order to avoid known archeological sites shown on the site map.
2) Predictable effects of both direct (forest harvesting and management and construction and maintenance) and indirect (collecting and erosion) types should be considered in all future planning.
3) The site coordination review system (SR-88 review) should continue as a basis for notification of proposed land use. To assist in the often time consuming task of intensive archeological survey the preparation of proposed land use permit applications should be completed well in advance of the scheduled starting date. The exact time needed to examine a given tract of land will depend on the size of the tract and the overall ground surface visibility, so we recommend early notification at least three months in advance of the starting date. In the event of large scale projects (i.e. in excess of 50 acres) the earlier the notification, the earlier the completion of necessary archeological investigations can be accomplished.
4) Planning of future facilities and other land alteration-type projects should be conducted in consultation with the included site density map and the known distribution of sites. Avoidance whenever possible of the three high probability site areas should be considered to preserve these potentially significant regions.
5) To determine the exact nature of forest management practices on the archeological resources, we recommend sample monitoring of thinning, clear cutting and planting aspects of this operation. Such a controlled study of the direct effects of forestry practices will permit more informed recommendations regarding the extent of such practices on cultural resources.
6) Every attempt should be made to bring the Department of Energy into compliance with appropriate laws and regulations regarding cultural resources through constant consultations and report preparation relating to any planned projects. This should be accomplished in consultation with the Office of Historic Preservation, State of South Carolina.
7) To accomplish the goal of compliance, a second phase of archeological reconnaissance should be implemented for purposes of identifying all historic properties within the plant boundaries as set forth in 36 CFR Part 64 (Draft). This continued reconnaissance should be directed toward achieving a more reliable sample of the site population at the plant and a thorough documentation of the sites for determination of significance. Under present categories of historic properties, the best alternative would at this time appear to be a request for determining the plant to be multiple resource district however any recommendations must await the results of the next reconnaissance phase.
8) Since the analysis and review of historical cultural resources within

the S.R.P. were not possible in the initial reconnaissance, such studies should be of high priority in the next phase of research.
9) Intensive archeological surveys should be conducted as soon as possible for two specific project areas, the proposed S-Area (SU 77-61) and the Siviculture Biomass Energy Farm (SU 78-14 R). Since both of these projects have a high priority in the Department of Energy plans, the next phase of contractual research at the S.R.P. should begin with these areas.
10) Future research on the Savannah River Plant should involve a more formalized reporting process on a project specific basis. Where archeological investigations exceed several days and involve over 50 acres, a report of investigations should be prepared to assist the Department of Energy in complying with environmental regulations. Specific aspects of research such as the historical review and analysis and the investigation of prehistoric settlement-subsistence patterns should be presented as reports upon completion. Finally, the results of the general plant reconnaissance with future management recommendations should be presented in annual progress reports summarizing the results until the reconnaissance is completed.
11) As a final recommendation we would like to suggest that future contractual arrangements be made so that flexible use of the researchers' time is possible. In essence, this flexibility would allow for the investigation of emergency projects outside the initial contract without diminishing the support for the general site use planning committment or the general site reconnaissance. A proposal for continued research on the Savannah River Plant will be presented to the Department of Energy within one month of the acceptance of this report.

APPENDIX A

SUMMARY TABLE: PREHISTORIC SITE LOCATION AND CULTURE-HISTORICAL AFFILIATION

KEY:

Site Dimensions

i = indeterminant site size

Landform/Topographic Position

- FP-Floodplain
- TE-Terrace
- SE-Swamp edge
- PT-Point
- HT-Hilltop
- HS-Hill slope
- RS-Ridge slope
- RT-Ridge top
- RN-Ridge nose

Aspect

- D-Direct
- N-North
- E-East
- S-South
- W-West
- NE-Northeast
- NW-Northwest
- SE-Southeast
- SW-Southwest

Drainage System

- UTR-Upper Three Runs Creek and tributaries
- SR-Savannah River
- FM-Four Mile Creek and tributaries
- PB-Pen Branch and tributaries
- SC-Steel Creek and tributaries
- LTR-Lower Three Runs Creek and tributaries
- SK-Salkahatchie River and tributaries

Soil Type

- 1-Americus Loamy Sand
- 2-Vaucluse and Blaney
- 3-Mascotte Sand
- 4-Dotham and Norfolk
- 5-Fuquay and Wagram
- 6-Grady and Bayboro
- 7-Johnson and Okenee
- 8-Ocila and Albany
- 9-Kalmia and Johns
- 10-Lakeland and Kershaw
- 11-Orangeburg and Red Bay
- 12-Troup Sand
- 12T-Troup Sand on Terrace
- 13-Leaf and Wahnee
- 15-Lucy and Wagram
- 17-Gunter Sand
- 18-Osier Sand
- 19-Izagora Sandy Loam
- 20-Mixed/unspecific Soils

Culture-Historical Affiliation

- UPLS-Undiagnostic Lithic Scatter
- EA-Early Archaic
- MA-Middle Archaic
- LA-Late Archaic
- EW-Early Woodland
- W-Unspecific Woodland
- M-Mississippian

PREHISTORIC SITE LOCATION AND CULTURE-HISTORICAL AFFILIATION

Site	Site Dimensions (meters)	Landform/ Topographic Position	Elevation (feet)	Aspect	Slope %	Rank of Nearest Stream	Drainage System	Distance to Water (meters)	Soil Type	Culture-Historical Affiliation
38AK34	750x750	FP	160	D	0	4	UTR	75	12T	EW,M
38AK35	100x100	HS	190	E	5	5	UTR	500	9	EW
38AK36	i	HS	250	NE	4	2	UTR	400	2	W
38AK57	i	TR	200	NE	10	3	UTR	100	9	W
38AK60	80x80	RS	330	SE	5	4	UTR	250	12T	W
38AK61	i	RS	210	SE	3	4	UTR	250	2	UPLS
38AK63	130x10	RS	210	SE	4	4	UTR	400	20	W
38AK64	2x2	RS	190	SE	5	4	UTR	300	20	EA,W
38AK65	3x3	RS	240	SE	5	4	UTR	650	2	UPLS
38AK66	70x35	RS	180	D	0	4	UTR	300	9	UPLS
38AK67	135x70	RS	180	D	0	2	UTR	150	9	W
38AK68	15x7	RS	190	SE	2	2	UTR	150	7	UPLS
38AK69	15x15	TR	230	SE	3	2	UTR	200	12	W,
38AK75	20x7	FP	180	SE	3	2	UTR	25	12T	W
38AK76	30x7	HS	190	SE	5	2	UTR	400	9	UPLS
38AK77	7x5	HS	190	SE	3	4	UTR	900	12T	W
38AK78	30x10	HS	210	SE	5	1	UTR	450	7	W
38AK79	i	HS	220	SE	2	2	UTR	150	7	W
38AK85	50x85	HS	210	SE	3	2	UTR	200	12T	EA,W
38AK86	i	SP-FP	200	E	4	2	UTR	50	17	UPLS
38AK87	1x1	HS	210	S	3	1	UTR	700	5	M
38AK88	100x100	HS	200	SE	1	1	UTR	300	12T	EW,W
38AK89	i	HS	190	SE	2	1	UTR	200	12T	EA,W
38AK90	70x15	HS	180	SE	1	1	UTR	100	12T	UPLS
38AK91	50x25	SE	160	S	3	5	UTR	700	7	UPLS
38AK92	35x15	SE	170	NE	3	3	UTR	250	12T	UPLS
38AK93	260x70	SE	210	E	8	2	UTR	125	20	W
38AK94	15x7	HS	240	E	7	2	UTR	225	20	LA,W
38AK95	15x15	SE	200	W	4	2	UTR	125	20	EW
38AK98	50x100	SE	210	SW	5	2	UTR	150	15	UPLS
38AK99	70x7	SE	210	SW	5	2	UTR	300	5	UPLS
38AK100	70x35	SE	230	E	6	1	UTR	50	7	UPLS
38AK101	33x33	HS	210	SE	7	3	UTR	200	12T	UPLS
38AK102	100x33	SE	220	SW	9	3	UTR	300	11	W
38AK103	25x8	HS	230	E	6	1	UTR	100	2	W

PREHISTORIC SITE LOCATION AND CULTURE-HISTORICAL AFFILIATION

Site	Site Dimensions (meters)	Landform/ Topographic Position	Elevation (feet)	Aspect	Slope %	Rank of Nearest Stream	Drainage System	Distance to Water (meters)	Soil Type	Culture-Historical Affiliation
38AK104	33x17	HS	240	SW	5	1	UTR	150	2	UPLS
38AK105	200x67	HS	240	S	9	2	UTR	400	20	EW,W
38AK106	25x17	HS	160	NW	9	1	UTR	100	20	W
38AK107	100x10	HS	350	D	0	1	UTR	350	5	EA
38AK108	i	HS	310	NW	4	1	NTR	150	20	UPLS
38AK109	40x40	HS	310	N	5	1	UTR	300	20	W
38AK110	50x50	HS	190	SE	9	5	UTR	600	20	EW
38AK111	33x50	HS	160	SE	8	5	UTR	450	7	UPLS
38AK112	25x8	HS	150	S	6	5	UTR	400	7	UPLS
38AK113	1x1	HS	310	S	5	1	UTR	200	4	UPLS
38AK114	33x33	HS	340	W	2	1	UTR	1050	4	LA
38AK115	33x33	HS	350	D	0	1	UTR	900	11	UPLS
38AK116	i	HS	290	W	5	1	UTR	1550	4	UPLS
38AK117	i	HT	380	D	0	1	UTR	1225	5	UPLS
38AK118	67x8	HS	320	SE	2	1	UTR	1150	5	LA
38AK119	33x133	TE	100	SE	3	3	UTR	75	13	W,M
38AK120	133x25	HT	150	D	0	5	UTR	750	7	UPLS
38AK121	17x13	TE	100	SE	3	5	UTR	200	13	UPLS
38AK123	1x1	TE	100	SE	5	5	UTR	225	9	UPLS
38AK124	133x67	HT	150	D	0	5	UTR	1000	1	UPLS
38AK126	250x250	HT	150	D	0	1	SR	250	19	UPLS
38AK127	100x100	SW	140	D	0	1	SR	100	9	UPLS
38AK128	i	TE	140	D	0	1	SR	300	19	UPLS
38AK129	66x33	HS	150	SE	4	5	UTR	1100	20	W
38AK130	66x33	HS	150	NE	5	5	UTR	1100	7	MA,W
38AK136	i	HS	250	NE	5	5	UTR	950	7	UPLS
38AK137	1x1	HS	180	SE	5	5	UTR	1300	11	UPLS
38AK138	1x1	HS	170	NE	4	1	UTR	25	11	UPLS
38AK139	80x80	PT	170	SE	5	5	UTR	350	9	EA,LA,EW,W
38AK140	1000x1000	HS	140	NE	5	1	UTR	100	20	EA,EW,W
38AK141	600x600	HS	150	NE	3	1	UTR	10	20	EW ,W
38AK142	300x100	SE	160	NE	5	1	UTR	100	20	EW ,W
38AK143	300x200	SE	160	S	2	1	UTR	50	20	EW ,W
38AK144	120x40	HS	160	S	2	1	UTR	100	12T	EW

PREHISTORIC SITE LOCATION AND CULTURE-HISTORICAL AFFILIATION

Site	Site Dimensions (meters)	Landform/ Topographic Position	Elevation (feet)	Aspect	Slope %	Rank of Nearest Stream	Drainage System	Distance to Water (meters)	Soil Type	Culture-Historical Affiliation
38AK145	30x30	SE	130	S	1	5	UTR	200	9	UPLS
38AK146	25x20	SE	210	SE	5	3	FM	200	14	UPLS
38AK147	25x25	BL	160	NE	9	1	UTR	50	20	W
38AK148	35x15	SE	190	E	5	3	FM	250	12T	W
38AK149	58x25	TE	170	NE	4	3	FM	75	12T	EW,W
38AK150	20x7	SE	230	NE	5	3	FM	125	11	UPLS
38AK151	100x25	BL	260	NW	9	1	UTR	100	20	UPLS
38AK152	1x1	BL	210	NE	7	5	UTR	100	20	W
38AK153	70x20	HS	220	NW	10	1	UTR	150	2	W
38AK154	70x70	HS	230	NW	10	1	UTR	150	2	W
38AK155	60x40	HS	250	D	0	1	UTR	200	20	W
38AK156	1x1	BL	190	NE	11	5	UTR	250	1	W
38AK157	100x70	PT	230	NE	10	5	UTR	250	1	UPLS
38AK158	70x70	HS	200	NE	7	1	UTR	50	1	W
38AK159	i	HS	240	NE	7	1	UTR	50	1	UPLS
38AK160	7x70	HS	250	N	6	1	UTR	50	5	UPLS
38AK161	17x10	HS	210	D	0	1	UTR	400	10	UPLS
38AK162	57x13	HS	210	D	0	1	UTR	600	10	UPLS
38AK163	100x33	TE	160	SE	4	3	FM	100	12T	EA
38AK164	67x67	HS	150	NW	8	5	UTR	100	20	MA,W
38AK165	i	TE	100	D	0	5	UTR	75	20	UPLS
38AK166	100x13	TE	150	D	0	5	UTR	900	12T	EW,W
38AK167	3x3	TE	140	NW	5	5	UTR	200	12T	UPLS
38AK168	20x10	HS	200	NE	9	1	UTR	200	20	UPLS
38AK169	25x7	HS	250	SW	5	1	UTR	625	2	UPLS
38AK170	70x70	SE	200	N	7	3	FM	100	2	UPLS
38AK171	i	HS	260	SW	4	1	SC	300	4	W
38AK211	1x1	RN	230	SE	8	4	UTR	200	20	UPLS
38AK212	1x1	RS	220	SE	7	1	UTR	250	20	UPLS
38AK213	i	TE	170	NW	4	4	UTR	100	7	UPLS
38AK214	2x2	TE	170	NW	8	1	UTR	75	7	UPLS
38AK215	2x2	RS	250	NW	10	1	UTR	100	20	UPLS
38AK216	3x3	RS	280	NW	10	1	UTR	150	20	UPLS
38AK218	1x1	RT	200	SE	5	1	UTR	200	7	UPLS
38AK220	80x60	TE	220	SE	5	2	UTR	50	12T	EW,WM

PREHISTORIC SITE LOCATION AND CULTURE-HISTORICAL AFFILIATION

Site	Site Dimensions (meters)	Landform/ Topographic Position	Elevation (feet)	Aspect	Slope %	Rank of Nearest Stream	Drainage System	Distance to Water (meters)	Soil Type	Culture-Historical Affiliation
38AK221	5x10	TE	220	SW	3	2	UTR	100	12T	UPLS
38AK222	50x40	TE	260	SE	2	4	UTR	300	10	W
38AK223	100x50	TE	200	N	5	3	UTR	100	1	W
38AK224	400x100	TE	200	SW	7	3	UTR	100	20	EA,MA,EW,WM
38AK225	5x5	HS	290	S	3	1	UTR	150	5	UPLS
38AK226	25x45	HS	290	SE	2	2	UTR	100	5	UPLS
38AK227	i	RS	250	SE	8	1	UTR	250	20	UPLS
38AK228	100x100	TE	100	D	0	5	SR	75	19	UPLS
38BR31	120x160	TE	120	D	0	3	FM	125	12T	EW,W
38BR32	40x40	TE	120	D	0	4	FM	650	12T	EW,W
38BR35	167x167	TE	120	NW	2	4	FM	100	12T	W
38BR36	40x80	TE	100	SE	2	4	PB	250	12T	W
38BR37	400x400	TE	95	D	0	4	PB	300	12T	W
38BR38	800x800	TE	110	S	2	4	PB	200	6	UPLS
38BR39	80x100	SP	105	SW	3	4	PB	300	12T	W
38BR40	40x120	TE	100	D	0	1	PB	200	12T	MA ,W,
38BR41	i	TE	105	S	3	4	PB	400	12T	W
38BR42	80x100	TE	100	SW	3	4	PB	350	12T	EA,W
38BR43	800x800	TE	120	SE	3	4	PB	250	12T	W
38BR44	1500x1500	TE	100	E	4	4	SC	75	7	EA
38BR45	1x1	TE	110	SE	4	4	SC	300	11	W
38BR47	100x133	TE	120	NW	2	4	PB	150	9	MA
38BR48	1x1	HS	340	D	0	1	SK	1200	5	UPLS
38BR49	1x1	HT	320	D	0	1	UTR	600	10	UPLS
38BR54	333x83	TE	160	NE	3	3	FM	75	12T	UPLS
38BR55	200x33	TE	120	S	4	4	SC	50	7	EW,W
38BR56	7x17	TE	140	SW	3	3	SC	250	12T	UPLS
38BR58	50x50	TE	180	SE	4	3	FM	100	12T	EW,W
38BR59	67x7	TE	170	E	2	3	FM	100	12T	EW,W
38BR60	7x7	HS	280	SW	3	1	FM	100	5	UPLS
38BR61	83x25	HS	220	NW	8	3	FM	150	2	UPLS
38BR62	100x167	TE	170	SE	6	4	FM	150	12T	W
38BR63	167x67	TE	180	SE	7	4	FM	200	12T	UPLS

PREHISTORIC SITE LOCATION AND CULTURE-HISTORICAL AFFILIATION

Site	Site Dimensions (meters)	Landform/ Topographic Position	Elevation (feet)	Aspect	Slope %	Rank of Nearest Stream	Drainage System	Distance to Water (meters)	Soil Type	Culture-Historical Affiliation
38BR64	1x1	HS	270	D	0	1	FM	325	5	UPLS
38BR65	67x67	HS	170	NW	6	1	FM	125	15	UPLS
38BR66	1x1	HS	250	NW	2	2	FM	500	5	W
38BR67	1x1	HS	240	NE	4	2	FM	100	17	W
38BR68	1x1	SP	270	D	0	1	PB	1050	4	UPLS
38BR69	33x33	TE	250	SE	3	2	PB	100	4	UPLS
38BR70	13x13	HS	260	SW	5	2	PB	275	17	W
38BR71	33x33	HS	230	SW	4	2	PB	200	4	UPLS
38BR72	267x33	SE	270	NW	4	2	PB	300	4	UPLS
38BR73	i	SP	230	SW	4	1	PB	175	5	UPLS
38BR74	i	HS	210	SW	4	1	PB	50	5	UPLS
38BR75	67x67	HS	240	W	6	3	PB	325	4	UPLS
38BR76	33x33	HS	200	NW	5	3	PB	275	5	UPLS
38BR77	13x13	SE	190	NW	5	3	PB	225	5	W
38BR78	33x13	SE	190	NW	5	3	PB	200	2	W
38BR79	1x1	SE	250	NW	5	3	FM	150	2	UPLS
38BR80	2x2	HS	250	SW	5	2	FM	100	2	UPLS
38BR81	i	HS	260	NW	5	2	FM	75	2	UPLS
38BR82	i	SE	250	NW	5	3	FM	150	2	UPLS
38BR83	67x67	HS	250	NW	5	3	FM	350	2	UPLS
38BR84	i	HS	260	NW	6	2	FM	100	4	UPLS
38BR85	2x2	HS	270	SW	3	1	FM	50	4	UPLS
38BR86	67x267	HT	330	D	0	1	FM	150	4	W
38BR87	20x20	HS	300	SE	4	1	PB	125	5	UPLS
38BR88	3x3	HS	300	NW	3	1	PB	200	2	UPLS
38BR89	3x3	PT	310	NE	5	1	SC	300	2	UPLS
38BR90	1x1	HS	270	SW	5	1	SC	100	5	UPLS
38BR91	33x7	HS	250	SE	5	2	SC	200	5	W
38BR92	i	HS	290	SW	3	1	SC	150	5	UPLS
38BR93	1x1	TE	210	NW	6	2	SC	100	2	UPLS
38BR94	2x2	HS	270	W	6	1	SC	100	5	UPLS
38BR95	67x17	HS	250	NW	6	1	SC	50	2	EA
38BR96	27x13	HS	150	E	6	3	PB	100	11	W
38BR97	13x13	TE	150	NE	5	4	PB	100	7	EW,W
38BR98	67x67	HS	170	SW	7	4	PB	200	15	UPLS

PREHISTORIC SITE LOCATION AND CULTURE-HISTORICAL AFFILIATION

Site	Site Dimensions (meters)	Landform/ Topographic Position	Elevation (feet)	Aspect	Slope %	Rank of Nearest Stream	Drainage System	Distance to Water (meters)	Soil Type	Culture-Historical Affiliation
38BR99	40x13	HS	180	NW	8	3	PB	175	11	UPLS
38BR100	7x7	HS	190	SE	6	3	PB	200	15	UPLS
38BR102	7x7	HS	160	E	6	3	SC	100	2	UPLS
38BR103	1x1	HS	180	SE	8	3	SC	250	2	UPLS
38BR104	100x100	HS	150	SE	7	3	SC	200	15	UPLS
38BR105	133x133	TE	180	SE	7	3	SC	300	5	UPLS
38BR106	13x13	TE	190	S	4	3	SC	200	5	W
38BR107	150x8	HS	180	NW	8	3	SC	100	2	UPLS
38BR108	40x80	HS	160	SW	5	3	SC	200	12	LA
38BR109	27x13	HS	170	SE	3	4	SC	400	12T	W
38BR110	1x1	HS	160	SE	3	4	SC	550	12T	UPLS
38BR111	1x1	HS	160	NE	7	4	SC	150	7	UPLS
38BR112	67x10	TE	130	NW	4	4	SC	200	5	UPLS
38BR113	1x1	TE	130	SW	4	4	SC	275	5	UPLS
38BR151	1x1	HS	240	S	5	4	UTR	250	5	UPLS
38BR153	2x2	HS	200	NE	5	1	LTR	250	12T	UPLS
38BR154	1x1	HS	230	E	5	1	LTR	300	12T	UPLS
38BR155	10x5	HT	260	D	0	1	LTR	600	12T	UPLS
38BR156	1x1	HS	240	NW	5	2	LTR	400	2	UPLS
38BR157	1x1	HS	170	SE	5	2	LTR	200	7	UPLS
38BR158	5x7	HS	210	D	0	2	LTR	550	10	UPLS
38BR160	30x7	HS	230	SW	2	1	LTR	850	17	UPLS
38BR161	8x3	HS	320	D	0	1	SC	850	4	EA
38BR162	20x5	HT	330	E	3	1	SC	825	4	UPLS
38BR163	2x2	HT	330	W	2	1	SC	850	4	UPLS
38BR164	1x1	HS	270	SW	2	1	SC	525	4	UPLS
38BR165	20x7	HS	250	SW	2	1	SC	800	4	UPLS
38BR166	1x1	TE	140	D	0	1	SC	525	12T	UPLS
38BR167	8x3	TE	140	D	0	1	SC	325	12T	UPLS
38BR168	10x10	TE	140	SW	4	2	SC	150	12T	UPLS
38BR169	20x7	TE	130	S	3	2	SC	200	17	UPLS
38BR170	100x25	SE	130	S	1	1	SC	400	12	W
38BR171	1x1	HS	270	SW	4	1	SC	400	4	UPLS
38BR172	1x1	HS	190	W	2	4	SC	500	5	UPLS
38BR173	25x7	TE	140	D	0	1	SC	350	17	UPLS

PREHISTORIC SITE LOCATION AND CULTURE-HISTORICAL AFFILIATION

Site	Site Dimensions (meters)	Landform/ Topographic Position	Elevation (feet)	Aspect	Slope %	Rank of Nearest Stream	Drainage System	Distance to Water (meters)	Soil Type	Culture-Historical Affiliation
38BR174	15x7	TE	140	D	0	1	SC	450	12T	UPLS
38BR176	125x35	TE	130	D	0	1	SC	450	12T	EA, LA
38BR177	15x17	SE	100	D	0	5	SC	500	12T	UPLS
38BR179	50x20	TE	100	S	2	4	PB	1150	6	UPLS
38BR180	12x10	TE	110	D	0	1	SC	100	12T	UPLS
38BR181	10x5	SE	130	D	0	5	SC	550	12T	UPLS
38BR182	15x25	TE	110	D	0	1	SC	100	12T	UPLS
38BR183	1x1	TE	120	D	0	4	SC	200	12T	UPLS
38BR184	5x5	TE	120	D	0	4	SC	150	12T	UPLS
38BR185	75x50	TE	110	D	0	4	SC	150	12T	UPLS
38BR186	5x5	TE	120	D	0	4	SC	150	12T	UPLS
38BR187	4x10	TE	115	D	0	4	SC	150	12T	UPLS
38BR188	40x5	HS	180	W	3	3	UTR	700	5	UPLS
38BR190	1x1	HS	245	D	0	1	SC	550	12T	UPLS
38BR191	50x20	TE	115	D	0	1	PB	50	12T	UPLS
38BR192	20x20	TE	100	NW	2	2	PB	150	12T	UPLS
38BR193	50x10	TE	100	D	0	2	PB	50	12T	UPLS
38BR194	1x1	TE	100	D	0	1	PB	650	12T	UPLS
38BR195	1x1	TE	100	D	0	4	PB	850	12T	UPLS
38BR196	1x1	TE	105	S	2	4	PB	1150	12T	UPLS
38BR197	1x1	HS	200	S	4	1	LTR	300	5	UPLS
38BR198	80x7	FP	170	S	4	4	LTR	350	5	W,
38BR199	1x1	HS	250	W	5	4	SC	400	2	UPLS
38BR200	10x10	SE	100	D	0	4	PB	1000	12T	UPLS
38BR201	i	TE	110	SE	5	4	PB	50	9	W
38BR202	250x75	TE	150	E	5	4	PB	400	9	UPLS
38BR203	150x20	TE	140	3	2	1	PB	350	19	UPLS
38BR204	50x50	TE	120	W	8	4	FM	150	12T	UPLS
38BR205	7x10	TE	130	SW	4	1	PB	75	12T	UPLS
38BR206	100x25	TE	130	SW	3	1	PB	300	12T	UPLS
38BR207	i	TE	120	SW	2	1	PB	800	12T	W
38BR208	300x50	TE	105	E	1	4	PB	150	12T	W
38BR209	50x20	TE	100	S	3	4	PB	700	12T	W
38BR210	i	TE	105	SE	1	4	PB	100	12T	UPLS
38BR211	1x1	HS	290	D	0	1	LTR	300	5	UPLS

PREHISTORIC SITE LOCATION AND CULTURE-HISTORICAL AFFILIATION

Site	Site Dimensions (meters)	Landform/ Topographic Position	Elevation (feet)	Aspect	Slope %	Rank of Nearest Stream	Drainage System	Distance to Water (meters)	Soil Type	Culture-Historical Affiliation
38BR212	1x1	HS	290	D	0	1	LTR	175	5	UPLS
38BR213	1x1	TE	130	S	1	1	PB	175	9	UPLS
38BR214	1x1	TE	140	D	0	1	PB	300	19	UPLS
38BR215	1x1	TE	150	D	0	1	FM	525	12T	UPLS
38BR216	75x25	HS	120	NW	3	4	FM	100	12T	UPLS
38BR217	1x1	TE	120	S	1	4	PB	450	12T	UPLS
38BR218	125x10	TE	105	SW	2	1	PB	1500	11T	UPLS
38BR219	30x5	HS	310	D	0	1	UTR	650	10	UPLS
38BR220	30x15	TE	250	SW	7	3	UTR	300	10	EW ,W
38BR221	100x20	TE	90	D	0	1	FM	1050	11T	UPLS
38BR222	50x250	TE	100	D	0	4	FM	75	12T	W
38BR223	40x20	TE	100	D	0	4	FM	150	12T	UPLS
38BR224	25x10	TE	110	D	0	4	FM	400	8	UPLS
38BR225	150x100	TE	115	S	5	1	SC	350	11	UPLS
38BR226	15x15	TE	230	NW	15	3	UTR	75	7	UPLS
38BR227	10x10	RS	300	N	2	1	UTR	850	17	EW,W
38BR228	i	RS	260	SW	3	2	SK	450	17	EW,W
38BR229	1x1	RS	290	S	4	1	LTR	500	5	UPLS
38BR230	100x20	HS	300	SW	6	1	UTR	100	9	UPLS
38BR231	75x20	HS	260	NE	5	1	UTR	100	2	W
38BR232	2x2	HS	260	E	4	1	UTR	125	5	UPLS
38BR233	75x6	RT	270	D	0	1	LTR	350	12T	UPLS
38BR234	125x10	TE	120	SW	3	1	SC	600	17	UPLS
38BR235	15x20	PT	200	NE	5	1	LTR	100	5	UPLS
38BR236	25x10	RS	190	S	8	1	LTR	75	7	UPLS
38BR237	300x200	RS	180	SE	3	1	LTR	75	7	LA,W
38BR238	5x7	HS	200	NE	5	1	LTR	500	17	UPLS
38BR239	90x65	HS	180	NE	5	2	LTR	150	12	UPLS
38BR240	100x85	RT	220	SW	3	2	LTR	100	12	EA,W
38BR241	25x50	HT	260	D	0	1	LTR	200	10	UPLS
38BR242	10x5	HS	260	NE	7	1	UTR	200	2	UPLS
38BR243	60x100	HS	90	S	8	5	SC	300	15	UPLS
38BR244	10x15	TE	120	SW	3	1	SC	200	17	LA
38BR245	50x10	HT	130	D	0	4	PB	350	9	UPLS
38BR246	7x5	HS	170	NE	7	2	LTR	100	11	UPLS
38BR247	75x50	TE	180	N	3	2	LTR	200	12	UPLS

APPENDIX B

SUMMARY TABLE: ARTIFACT SUMMARY (ALL SITES WITH COLLECTIONS)

SITE	DEBITAGE			TOOLS					PREHISTORIC CERAMICS	HISTORIC COMPONENT
	Primary Flakes	Secondary Flakes	Flakes of Bifacial Retouch	Bifaces	Point Knives	Unifaces	Cores	Cobble Tools		(Present/ Absent)
38AK34	1	5	194	1	6	1	1	3	87	P
38AK35			27						14	A
38AK36			2						1	A
38AK57			3						1	P
38AK60			15						2	A
38AK61			1							P
38AK62										P
38AK63			148		2				6	A
38AK64				1					1	A
38AK65			3							A
38AK66		1	1							P
38AK67			2						1	A
38AK68			6							A
38AK69		1			1				1	A
38AK70										P
38AK71										P
38AK72										P
38AK73										P
38AK74										P
38AK75			9						2	A
38AK76			10							A
38AK77									2	A
38AK78			1						1	A
38AK79			1						1	A
38AK85			12		1			1	5	A
38AK86			3	1						A
38AK87									2	P
38AK88		3	120	12					46	A
38AK89			58		1					A
38AK90			7						2	A
38AK91			11			3		1		A
38AK92			4							P
38AK93			40			1			31	A
38AK94			7		1				4	A
38AK95			9						2	A

ARTIFACT SUMMARY

SITE	DEBITAGE			TOOLS					PREHISTORIC CERAMICS	HISTORIC COMPONENT
	Primary Flakes	Secondary Flakes	Flakes of Bifacial Retouch	Bifaces	Point/ Knives	Unifaces	Cores	Cobble Tools		(Present/ Absent)
38AK96										P
38AK97										P
38AK98		1	12							A
38AK99	1	2	66	2			1			A
38AK100		1	5	1						A
38AK101	1		2							A
38AK102			60						3	A
38AK103			25						2	A
38AK104			5							A
38AK105	1		52						20	A
38AK106			11						1	A
38AK107			3		1	1				P
38AK108			6	1						A
38AK109									1	P
38AK110			13						1	P
38AK111			19							A
38AK112			62							P
38AK113				1						A
38AK114			7		1					P
38AK115			2	1						P
38AK116			1							A
38AK117			1							A
38AK118			1		1					P
38AK119			39						11	P
38AK120			3							P
38AK121			9							A
38AK122										P
38AK123			1							A
38AK124			5							P
38AK125										P
38AK126			13							P
38AK127			2							P
38AK128			1							A
38AK129			19						2	A
38AK130			2		2	1			1	A

ARTIFACT SUMMARY

SITE	DEBITAGE			TOOLS					PREHISTORIC CERAMICS	HISTORIC COMPONENT
	Primary Flakes	Secondary Flakes	Flakes of Bifacial Retouch	Bifaces	Point / Knives	Unifaces	Cores	Cobble Tools		(Present/ Absent)
38AK136			1							A
38AK137			1							A
38AK138			1							A
38AK139			73	4	3	1			7	P
38AK140	1	1	195	4	1	1	2		75	P
38AK141			88	1					49	P
38AK142			62	2	9		2		80	P
38AK143			95	2		1	1		74	P
38AK144			188						7	A
38AK145			3	1						A
38AK146			3							A
38AK147			36		2				5	A
38AK148			1						2	A
38AK149			14						17	A
38AK150			3							P
38AK151			3							A
38AK152			29						1	A
38AK153			16						10	A
38AK154			7		1				2	A
38AK155			1		1				1	A
38AK156									1	A
38AK157			7							A
38AK158			31						3	P
38AK159			1	1						A
38AK160			2							A
38AK161			134							A
38AK162			68							A
38AK163			42		1					A
38AK164			88	3	1				4	A
38AK165				1						A
38AK166			3						11	A
38AK167			3							A
38AK168			20							A
38AK169			3							A
38AK170			6							A

ARTIFACT SUMMARY

SITE	DEBITAGE			TOOLS					PREHISTORIC CERAMICS	HISTORIC COMPONENT
	Primary Flakes	Secondary Flakes	Flakes of Bifacial Retouch	Bifaces	Point/ Knives	Unifaces	Cores	Cobble Tools		(Present/ Absent)
38AK171									4	A
38AK211			1							P
38AK212			1							A
38AK213			5							A
38AK214			5							P
38AK215			9							A
38AK216			1							P
38AK217										P
38AK218			1							A
38AK219										P
38AK220			155		1				65	A
38AK221			2							A
38AK222			1	1					1	A
38AK223			21						3	A
38AK224			807	5	19	3		3	78	P
38AK225			1							A
38AK226			6							A
38AK227			4							A
38AK228			9						4	A
38BR31	2	2	38					1	49	A
38BR32			11						11	A
38BR35			8						1	P
38BR36			3						23	A
38BR37			45	2		1			16	A
38BR38			178							A
38BR39			3		1				14	P
38BR40			248		4					A
38BR41			158		1				19	P
38BR42			160		5				6	A
38BR43			706	1	2				13	P
38BR44	3		591	2	3					P
38BR45			12						2	A
38BR47			50		1	1				P
38BR48			2							P
38BR49						1				A
38BR54			10							P
38BR55			50						32	A

ARTIFACT SUMMARY

SITE	DEBITAGE			TOOLS					PREHISTORIC CERAMICS	HISTORIC COMPONENT
	Primary Flakes	Secondary Flakes	Flakes of Bifacial Retouch	Bifaces	Point / Knives	Unifaces	Cores	Cobble Tools		(Present/ Absent)
38BR56			5							A
38BR57										P
38BR58			6						7	A
38BR59			16						4	A
38BR60			1							P
38BR61			19	1						A
38BR62			26						1	P
38BR63			10							A
38BR64						1				A
38BR65			3							A
38BR66					1					A
38BR67									1	A
38BR68			1							A
38BR69			4							A
38BR70			4						2	A
38BR71			6							A
38BR72			10							A
38BR73			4							A
38BR74			12							A
38BR75			2							A
38BR76			9							A
38BR77			3						1	A
38BR78			1						2	P
38BR79			1							A
38BR80			4							A
38BR81			1							A
38BR82			1							A
38BR83			6							P
38BR84			1							A
38BR85			9							A
38BR86			32		2	1			1	A
38BR87			2							A
38BR88			2							A
38BR89			2							A
38BR90			1							A
38BR91			1	1					1	A
38BR92			1							P
38BR93							1			A
38BR94			2							A
38BR95			3		1					A

ARTIFACT SUMMARY

SITE	DEBITAGE			TOOLS					PREHISTORIC CERAMICS	HISTORIC COMPONENT
	Primary Flakes	Secondary Flakes	Flakes of Bifacial Retouch	Bifaces	Point / Knives	Unifaces	Cores	Cobble Tools		(Present/ Absent)
38BR96									1	A
38BR97			9						1	A
38BR98			5							A
38BR99			14							A
38BR100			13							A
38BR102			5							A
38BR103			1							A
38BR104			316						1	P
38BR105			129							A
38BR106			2						1	A
38BR107			14							A
38BR108			8	2	1					A
38BR109			8						1	A
38BR110			1							A
38BR111			1							A
38BR112			51	1				1		P
38BR113			29							A
38BR150										P
38BR151			1							A
38BR152										P
38BR153			2							A
38BR154			1							A
38BR155			2							A
38BR156			1							A
38BR157			1							A
38BR158			3							A
38BR159										P
38BR160			10			1				A
38BR161			4		1					A
38BR162			15							P
38BR163			2							A
38BR164				1						A
38BR165			10							A
38BR166				1						A
38BR167			5							A
38BR168			7	1						A
38BR169			5							P
38BR170	1		494	4					6	A
38BR171			1							A
38BR172			1							A

ARTIFACT SUMMARY

SITE	DEBITAGE			TOOLS					PREHISTORIC CERAMICS	HISTORIC COMPONENT
	Primary Flakes	Secondary Flakes	Flakes of Bifacial Retouch	Bifaces	Point / Knives	Unifaces	Cores	Cobble Tools		(Present/ Absent)
38BR173			9							A
38BR174			14							A
38BR175										P
38BR176			465	5	3	1				A
38BR177			6							A
38BR178										P
38BR179			87		1					P
38BR180			4							A
38BR181			4							A
38BR182			9							A
38BR183			1							A
38BR184			1							P
38BR185			119							A
38BR186			8							A
38BR187			40							P
38BR188			4							A
38BR189										P
38BR190			1							A
38BR191			18							A
38BR192			4							A
38BR193			20							A
38BR194			1							A
38BR195			1							A
38BR196			1							A
38BR197			1							A
38BR198			9		1					A
38BR199			1							A
38BR200			4							P
38BR201			29						1	A
38BR202			12			1				P
38BR203			13							P
38BR204			20							A
38BR205			6							A
38BR206			4							P
38BR207			30		1				3	A
38BR208			94						2	P

ARTIFACT SUMMARY

SITE	DEBITAGE			TOOLS					PREHISTORIC CERAMICS	HISTORIC COMPONENT
	Primary Flakes	Secondary Flakes	Flakes of Bifacial Retouch	Bifaces	Point/ Knives	Unifaces	Cores	Cobble Tools		(Present/ Absent)
38BR209			13						3	P
38BR210			26							P
38BR211			1							A
38BR212			1							A
38BR213			1							A
38BR214			1							A
38BR215			1							P
38BR216			84							P
38BR217			1							A
38BR218			21							P
38BR219			8							A
38BR220			7						3	A
38BR221			5			1				A
38BR222			248						25	A
38BR223			32							P
38BR224			6							A
38BR225			420	1					2	A
38BR226			5							A
38BR227			3						1	A
38BR228			15	1					21	A
38BR229			1							A
38BR230			10							A
38BR231			90		1				9	A
38BR232			2							A
38BR233			29							P
38BR234			11							A
38BR235			3							A
38BR236			8	1						A
38BR237			281	7	3		1		2	A
38BR238			2							A
38BR239			12							A
38BR240			628		1				18	P
38BR241			3							P
38BR242			4							A
38BR243			127							A
38BR244			7		1					P
38BR245			3							A
38BR246			5							A
38BR247			8							P

APPENDIX C

SUMMARY TABLE: FREQUENCIES OF DIAGNOSTIC ARTIFACTS FROM PREHISTORIC SITES

SITE	CERAMICS-SURFACE DECORATION										POINTS							
	Plain	Fine Cord	Coarse Cord	Fabric	Linear Check Stamped	Check Stamped	Simple Stamped	Punctate	Complicated Stamped	Unclassified Pottery	Dalton	Palmer	Kirk	Morrow Mountain-Guilford	Savannah River	Triangular	Unclassified Point/Knife
38AK34	26				1	1	2		3	49						4	2
38AK35					1					13							
38AK36		1															
38AK57										1							
38AK60		1	1														
38AK63	4	1	1										1			1	
38AK64	1																
38AK67	1																
38AK69	1															1	
38AK75	1					1											
38AK77	1		1														
38AK78	1																
38AK79	1																
38AK85	3									2		1					
38AK87									2								
38AK88	12		4		15	3	2	2		8							
38AK89							1			1	1						
38AK93	6	3	1		4		2			15							
38AK94	4														1		
38AK95								1		1							
38AK102	1	2															
38AK103	1																
38AK105	4				9	2				5							
38AK106	1																
38AK107													1				

FREQUENCIES OF DIAGNOSTIC ARTIFACTS FROM PREHISTORIC SITES

SITE	CERAMICS-SURFACE DECORATION										POINTS							
	Plain	Fine Cord	Coarse Cord	Fabric	Linear Check Stamped	Check Stamped	Simple Stamped	Punctate	Complicated Stamped	Unclassified Pottery	Dalton	Palmer	Kirk	Morrow Mountain-Guilford	Savannah River	Triangular	Unclassified Point/Knife
38AK109			1														
38AK110					1												
38AK114															1		
38AK118															1		
38AK119	3	1							1	6							
38AK129		1	1														
38AK130		1											1			1	
38AK139	3				3					1		1			2		
38AK140	13	9	2		16		2			33		1					
38AK141	11	11	5	2		1	8			11							
38AK142	18	15	9			3	6	4		25						6	3
38AK143	14	8	2		17		8			25							
38AK144					1					6							
38AK147		3								2						2	
38AK148		1	1														
38AK149	6	2	1		2	1				5							
38AK152										1							
38AK153	4	1	2				1			2							

FREQUENCIES OF DIAGNOSTIC ARTIFACTS FROM PREHISTORIC SITES

SITE	CERAMICS-SURFACE DECORATION										POINTS								
	Plain	Fine Cord	Coarse Cord	Fabric	Linear Check Stamped	Check Stamped	Simple Stamped	Punctate	Complicated Stamped	Unclassified Pottery	Dalton	Palmer	Kirk	Morrow Mountain-Guilford	Savannah River	Triangular	Unclassified Point/Knife	
38AK154			1				1										1	
38AK155			1														1	
38AK156		1																
38AK158	1	2																
38AK163													1					
38AK164	2		2														1*	*Stanly
38AK166	8				1					2								
38AK171		3								1								
38AK220	25	15	1				5		1	18						1		
38AK222	1																	
38AK223	1	1					1											
38AK224	44	9	6			7	1	2	1	6	1	1	1		2	9	5	
38AK228		1	1							2								
38BR31	5	4	14			3	3			20								
38BR32	1	2	2		2	1				3								
38BR35		9	9			1				4								
38BR36		1																
38BR37	1	6	1			3				5								
38BR39		1	4			1				8						1		
38BR40													3					
38BR41		2	3			3	1			10							1	
38BR42	3	2				1						1				1	1	
38BR43	8	2	1			1				1							2	

FREQUENCIES OF DIAGNOSTIC ARTIFACTS FROM PREHISTORIC SITES

SITE	CERAMICS-SURFACE DECORATION										POINTS							
	Plain	Fine Cord	Coarse Cord	Fabric	Linear Check Stamped	Check Stamped	Simple Stamped	Punctate	Complicated Stamped	Unclassified Pottery	Dalton	Palmer	Kirk	Morrow Mountain-Guilford	Savannah River	Triangular	Unclassified Point/Knife
38BR44												1					2
38BR45										2							
38BR47														1			
38BR55	8	1	2	1	1	2	2	1		14							
38BR58	4						2			1							
38BR59	1				1		2										
38BR62				1													
38BR66																1	
38BR67	1																
38BR70	2																
38BR77			1														
38BR78							2										
38BR86	1																1
38BR91										1							
38BR95													1				
38BR96	1																
38BR97					1												
38BR106	1																
38BR108															1		
38BR109			1														
38BR161												1					
38BR170	3	1	1							1							
38BR176													1		1		1

FREQUENCIES OF DIAGNOSTIC ARTIFACTS FROM PREHISTORIC SITES

SITE	CERAMICS-SURFACE DECORATION										POINTS							
	Plain	Fine Cord	Coarse Cord	Fabric	Linear Check Stamped	Check Stamped	Simple Stamped	Punctate	Complicated Stamped	Unclassified Pottery	Dalton	Palmer	Kirk	Morrow Mountain-Guilford	Savannah River	Triangular	Unclassified Point/Knife
38BR198																1	
38BR201	1																
38BR207	2																1
38BR208	1		1														
38BR209	1	1	1														
38BR220	2						1										
38BR222	5	10				1				9							
38BR227							1										
38BR228	3	3	2			2	3			8							
38BR231	2					3				4							1
38BR237	2														1		2
38BR240	18										1						
38BR244															1		
38BR245										2							
38BR225										2							

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